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## ARTICLE I.

THE ICE-PERIOD:—THE ECONOMY OF GLACIERS AND THE THEORY OF THEIR FORMER EXTENSION OVER LARGE PORTIONS OF THE EARTH'S SURFACE.

### INTRODUCTORY NOTE.

HAVING, in the last two Nos. of the Eclectic,\* entertained and, we trust, instructed our readers by translations from the German of Prof. Agassiz, on the Ice-Period, another article on the same subject might be deemed by some superfluous. The Glacier theory, however, is so novel and startling,—so curious and wonderful are the historical evidences which it suggests of a long succession of stupendous events, on the earth's surface, which occurred far back of the memory of living man,—that we can hardly suppose any to have become so soon weary of its consideration. For ourselves, without venturing an opinion as to the truth of the theory, we hail with the liveliest interest every fact and argument which may tend either to support or destroy an hypothesis so bold, and yet, in many respects, so probable.

The following article is by no means a repetition of the discussion of the German Professor, which we have already published. It is rather a review of the theory there presented, with the history of its origin, and a statement of the evidences on which it at present rests. It is also the production of a mind, in no way interested by circumstances to maintain the hypothesis in question. Our English geologist contemplates the suggestions of M. Agassiz and his predecessors, as of foreign origin, and is disposed to scrutinize them, not with candor only, but with scepticism. Thus inclined to doubt, the arguments by which he has well nigh convinced himself, of the truth of what he was slow to believe, cannot fail to be interesting to others whose minds are similarly affected.—SR. ED.

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\* See Vol. III., pp. 307 and 521,—Nos. VIII. and IX.

From the Edinburgh Review, April, 1842.

1. *Mémoire sur la Variation de la Temperature dans les Alpes de la Suisse.* Par M. VENETZ, (Denkschriften der Allgemeinen Schweizerischen Gesellschaft. Band I. 2te Abtheilung.) Read 1821. Published 1833.
2. *Naturhistorische Alpenreise.* Von F. J. HUGI. 8vo. Solothurn : 1830.
3. *Notice sur la Cause probable du Transport des Blocs Erratiques de la Suisse.* Par M. J. DE CHARPENTIER. 8vo. pp. 20. Paris : 1835. (Extrait du Tome VIII. des Annales des Mines.)
4. *Discours prononcé à l'ouverture des séances de la Société Helvétique des Sciences Naturelles à Neufchatel, le 24 Juillet 1837.* Par L. AGASSIZ. 8vo. pp. 32. 1837.
5. *Etudes sur les Glaciers.* Par L. AGASSIZ. 8vo. With folio Atlas of Plates. Neufchatel: 1840.
6. *Theorie des Glaciers de la Savoie.* Par M. LE CHANOINE RENDU. 8vo. Chamberry : 1840.
7. *Essai sur les Glaciers, et sur le Terrain Erratique du Bassin du Rhone.* Par JEAN DE CHARPENTIER. 8vo. Lausanne : 1841.
8. *Etudes Géologiques dans les Alpes.* Par M. L. A. NECKER. Tome I. 8vo. Paris : 1841.

GEOLOGY as a science is subject to revolutions similar to those of which it treats. Alternations of opinion are as frequent as those of strata; and a change comes, from time to time, over the spirit of the cosmogonical dream, as one or another agent or mode of action seems best to fit the explanation of a certain large class of phenomena. At one time all in geology is turmoil, earthquake, and conflagration; at another, the speculator sees in the evidences of past change nothing but proofs of the long continuance of the existing comparatively peaceable state of things. For a series of years, whilst "Plutonism" was on the ascendant, all was to be accounted for by the latent or developed action of heat—at another time, water or an "universal menstruum" bathed the surfaces of our valleys and mountains, producing by its changing condition not only all the chemical, but nearly all the mechanical changes which the earth's surface has undergone.

A soberer spirit of philosophizing has united the two apparently inconsistent doctrines of geological change, and ascribes to fire and to water their respective shares in the manipulations—if we may use the phrase—which reduced the external crust of a once chaotic sphere to a condition fit for the existence and maintenance of varied organic bodies. But amidst the prevalence of that modified "Huttonianism" which expresses the geological creed of a great majority of the cosmogonists of the present day, one condition has been held as incontrovertible,



namely—that the ancient world was *hotter* than the modern one; that tropical animals inhabited the temperate and even the polar regions of the globe; and that the palm and tree fern clothed the shores where now flourish only the dwarf birch and the Norwegian pine. The fossil plants of the carboniferous period, and the shells of all but the most recent of the tertiary formations, point alike to a great but indeterminate excess of warmth in those times above the present.\* But the generalization so long accepted, is now assailed by a weight and combination of evidence which demands the fullest investigation. An agent, which may be termed *new* in the application which has been made of it, is now to be pressed into the service of geology; and the “Plutonism” of the older theorists, and the “Neptunism” of their successors, are about to be succeeded, in the history of hypothesis, by the universal ICE-FLOOD with which the modern school of Swiss Naturalists would invest our globe, from the tropics to the poles.

It is to explain the more recent and superficial changes of the earth's surface that the mechanical agency of permanent ice, or Glaciers, is proposed to be introduced. Even the fundamental questions of the aqueous or igneous origin of Granite and Trap rocks, and the doctrine of Universal Formations, have not been more keenly contested by geologists than the nature and duration of those processes by which the *most recent* geological changes have been effected, the final *contour* given to the soil, and large masses of rock detached from their natural position, and transported, whether to form gravel beds of enormous thickness or solid angular fragments, to surprising distances from their origin. Such phenomena are the accumulations called the *drift* in the south-east of England, the gravel beds of the Great Glen of Scotland, and the beaches of Glen Roy; the occurrence of fragments of granite, native only in the Scandinavian peninsula, dispersed along the southern shores of the Baltic, and the plains of Russia, Estonia, and Denmark; or lastly, the deposition, on the calcareous chain of the Jura, of angular masses of rock, which are only found *in situ* at distances of eighty and one hundred miles amongst the highest Alps. These and similar phenomena have been explained by some geologists by the energy of the moving power of a great flood, which swept over the earth's surface previous to the commencement of the present age of the world; whilst others have been found bold enough to maintain, that we see in action around us, even at this day, causes sufficiently energetic, if continued for an indefinite time, to have produced these apparently violent effects. The objections to both of these opinions will be stated in the course of this article. Suffice it to say, that assent to one or the other was rather extorted by the method of proof called a *reductio ad absurdum*—that is by proving the difficulty or impossibility of the contrary hypothesis—than by convincing the reason that one or the other was in itself probable. The new Swiss Schools of Geologists have proposed to them-

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\* Lyell's Elements of Geology, 1841, i. 285, ii. 125.

selves to maintain that both these theories are incorrect, and that the mechanical changes which the earth's surface has undergone, in that important and interesting period which seems to connect the actual era with the earlier epochs of geological history, were due to a great extension which the glaciers of the mountainous regions of the globe then experienced, constituting agents of transport and abrasion similar in kind to those which still exist, but exaggerated in their dimensions and energy.

Guided by the experience of past times in the reception or modification of geological hypotheses, we feel ourselves called upon, in the first place, to admit with caution the extensive operation of an agent which, though known, has not hitherto been admitted to play any great part in the modifications of the earth's surface. But more especially do we feel the necessity of not losing sight of any thing approaching to demonstrated truth in the science of geology as it stands, in our haste to adopt and appreciate what really is valuable in the novel theory. The rage for immature generalization, which is dangerous in all sciences, is especially so in that of geology, beset as it is in almost all its parts with conflicting evidence; evidence often the more conflicting in proportion as it is more detailed. The rejection of superfluous causes from science is, indeed, one of the first rules of philosophizing; but the danger in geology, we are persuaded, lies in the opposite direction—in the tendency to mutilate the evidence in order to fit the Procrustean bed of one great fundamental assumption. At all events, let Newton's rule be practically applied, by admitting with caution *new* general causes, not by attempting to subject to these every effect which admits of a different explanation.

The Memoirs and Works specified at the head of this article, all bear upon this recent geological innovation; for we consider as properly belonging to Geology whatever has reference to conditions of the earth's surface different from the present, although such modifications have occurred within historic times. It will be seen by the dates that the enquiry or suggestion is not altogether a new one. Twenty years ago the question of the ancient extension of glaciers was already agitated; and indeed we might have carried our citation of authors much further back, only that with the Memoir of Venetz dates the origin of the phase of geological speculation to which we have alluded. The authors (all living) have brought the subject, in a strictly geological point of view, from its fundamental facts (many of which had of course been admitted and reasoned upon by others) to its present bearing, and therefore to their writings we shall chiefly confine our attention; although, to be historically exact, we must, from time to time, recall the meritorious labors of their no less eminent predecessors.

It is plain, that an attempt to prove the vastly greater energy with which glaciers formerly acted in effecting geological changes, must be grounded on a study of those glaciers which now exist. Naturally, therefore, the rise of the theory in question occurred in Switzerland, and amongst persons whose attention had been forcibly called by local

and other circumstances to the conditions of glacial action as exhibited in the Alps. Unless we have rigorously determined what are the effects produced by existing glaciers, it is vain to argue about the proofs of their traces in positions where they are no longer found; and unless we have advanced so far as to analyze the origin of glaciers, the causes of their subsistence, and the conditions of their internal economy, we shall want positive arguments in support of their having existed in other places or under other circumstances. The study of glaciers, as forming a portion of physical geography, is very old indeed; and when we consider the eminence of the authors who have described them, and the infinite number of men of science who have visited them, we wonder perhaps that more should still be found to be said. The mechanism of a glacier is a problem of natural philosophy, and one much more difficult and embarrassing than it has commonly been supposed; and as the second question—namely, the efficiency of compact moving ice in modifying the earth's surface—is a strictly geological problem, and of comparatively recent date, geologists have begun, and very properly, by assuming, or establishing the laws of glacier-motion rather as the substratum of their speculations than as a distinct application of physical laws to a special case.

THE ECONOMY OF GLACIERS, and the HYPOTHESIS OF THEIR FORMER MUCH GREATER EXTENSION, are therefore two very distinct questions; both of which are treated of at some length in several of the works before us. We propose to consider these points separately; but first it may be well that we endeavor to present to the reader a picture of what a glacier is, and of the curious and beautiful appearances and transformations which it exhibits.

When we approach to examine a chain of mountains whose tops are constantly covered with snow, their acclivities green, and their bases clothed with wood—we should naturally expect to find a tolerably well marked line fixed by the level at which the snow never melts. Now this is very rarely, if ever, the case. The zones marked out by the limits of a growth of particular plants—the superior limit, for instance, of the chestnut, the beech, or the pine—are generally more clearly defined than the level of perpetual snow. This is soon found to be due, in a great measure, to the forms of the mountain sides in whose hollows the snow of winter, by accumulating, resists the summer's heat, which, had it lain only to its *mean* depth, must infallibly have caused it to disappear. Such cases occur even in climates where glaciers, properly speaking, are never found. The highest mountains in Britain, for instance those on the boundaries of Aberdeenshire and Inverness-shire, occasionally retain a portion of the winter's snow on their shady sides during the entire summer, without exhibiting any approach to the structure of a glacier.

A glacier, in the customary meaning of the term, is a mass of ice, which, descending below the usual snow line, prolongs its course down the cavity of one of those vast gorges which furrow the sides of most mountain ranges. It is better represented by a frozen torrent than by

a frozen ocean. Any one placed so as to see a glacier in connexion with the range from which it has its origin, at once infers that it is, in some sense or other, the outlet of the vast snow fields which occupy the higher regions. It is impossible to doubt that it results from, and is renewed by the eternal ice-springs of those riverless wilds. None who has ever seen or even clearly conceived a lava-stream, can fail to find in it the nearest analogue of a glacier. Stiff and rigid as it appears, no one can doubt that it either flows, or once has flowed. Were the glacier, like the flood of molten stone, the result of one great eruptive action, then its existence beneath the limits of the general snow line would be inexplicable. It melts—it must melt; it lies on warm ground yielding crops perhaps within a hundred yards of its lower extremity; the sun beats perpetually upon its icy pinnacles, which, though they reflect much, must retain some of the incident heat; and we see, accordingly, in a summer's day the glacier oozing out its substance from every pore—above, beneath, within. And yet, with all this the glacier wastes not; always consuming, it is never destroyed. Evident therefore it must be, upon this ground alone, that a glacier glides imperceptibly down its valley, and this independent of all direct measurements of its motion. These, as we shall presently show, fully corroborate the inference.

The glacier therefore moves progressively, or, if the reader pleases—it *flows*. The flood of water of the arrowy Rhone passes so swiftly, that the passenger almost giddily follows with his eye the bubbles which mark its flight;—the lava stream must be watched for some seconds or minutes, perhaps hours, to mark its progress:—the stately march of the glacier is yet a stage more slow; months and even years are but the units of division of its dial.

[We here omit the writer's interesting description of the glaciers of the Alps, the *névé* or *firn*, from which they are produced, and their various configurations and motions, all of which, though graphic and sublime, in the highest degree, is in substance the same as the description of M. Agassiz in the last No. of the *Eclectic*, (p. 521) to which the reader is referred.—*SR. ED.*]

Having thus sketched the whole course and transitions of the glacier world from its inferior outlets to its highest summits, and explained, in passing, the origin of many of its most remarkable configurations—we proceed to consider what have been proposed as theories of the mechanical functions of the glacier—its reproductive faculty, by which its waste is continually made good, and consequently the theory of its motion; how

“The glacier's cold and restless mass  
Moves onward day by day.”

To enter into detail respecting the arguments used by the advocates of the various hypotheses employed, would greatly exceed the limits of this article. We restrict ourselves, therefore, to a concise description



of the two great rival theories ; the main facts which appear to support each ; and to a few of the difficulties which appear to us to cause hesitation in the adoption of either. That we may not, however, seem to consider the subject hopeless, we shall suggest some experiments which may one day lead to a solution of these interesting questions.

The theory of De Saussure (which, though much older, owes its notoriety to his clear exposition of it) is simply this—that the accumulation of the snow in the higher ice-fields during the year, and especially in winter, forms not only the *pabulum* for the growth of the glacier, but is the glacier itself ;—the fusion of the snow, and the infiltration and congelation of the water forming the gritty ice of which the glacier proper, and also the lower part of the *névé*, is composed.\* The pressure of the accumulated snows (due not only to the mean fall on the area of the surface, but also to the discharge by avalanches from the steep sides) is the *moving cause* of the glacier, as the inferior extremity is melted away. According to this theory, the glacier melts, not only at its upper surface but at its lower one, owing to the contact of the ground beneath, which has a temperature above  $32^{\circ}$ . Now, this fusion beneath, evidenced by the flow of glacier streams even in winter, greatly facilitates the movement of the glacier along its inclined bed. It also accounts for the more rapid movement of the sides than the centre of the glacier ; since there the detachment of the glacier from the trough in which it lies is usually more complete. The *crevasses* are produced by the unequal velocity of the glacier in its different parts, and by the inequalities of the bottom over which it is compelled to heave its rigid and unwieldy mass.

The other theory, also very old—having been expounded by Scheuchzer above a century ago—ascribes to the glaciers *the same origin*, viz., the transformation of the *névé* into ice ; but to the *movement* of the glacier a very different one. The ice of glaciers not being solid, but porous—or rather, according to the authors who maintain this theory, fissured by minute cracks in every direction—the water melted at the surface is drawn by capillarity into these rents ; and during the immediately succeeding act of congelation, the mass of the glacier is momentarily increased by the expansion of this water in freezing. The swollen mass expands in the direction of least resistance—that is, vertically upwards or in thickness, and longitudinally forwards or in the direction of its motion. This theory, broached in later times by Toussaint de Charpentier, is maintained with much ingenuity of argument by Jean de Charpentier, Agassiz, and others.

In the course of the animated controversy still going on upon this subject, we have been struck by the occasional want of clear views as to physical principles, betrayed in the heat of argument upon the one side as upon the other. We will endeavor to state what we consider as real difficulties to each hypothesis ; and leave the reader to judge,

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In the course of the animated controversy still going on upon this subject, we have been struck by the occasional want of clear views as to physical principles, betrayed in the heat of argument upon the one side as upon the other. We will endeavor to state what we consider as real difficulties to each hypothesis ; and leave the reader to judge,

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\* De Saussure, § 526.

whether in the present state of the question he is prepared to give in his adhesion to either.

1. And first of the Gravitation Theory. De Saussure's views are most applicable to glaciers descending with considerable inclination, and through valleys of nearly equal breadth, without notable promontories, and gently widening as they descend. Such are several of the glaciers of Chamouni, to which this eminent man directed his chief attention—the Glacier du Bois (in part) and Bossons, and those of Miage and Brenva on the Italian side of Mont Blanc. But the case becomes different when the inclination is very small, the mass very extended, and the valley, instead of enlarging beneath, contracted towards its inferior extremity;—such as the remarkable glacier of Aletsch, into which fall the firs of the Jungfrau, Mönch, Eiger, and the mountains of the Upper Lötsch-thal, and which has its embouchure in a narrow ravine which joins the upper valley of the Rhone near Brieg. The upper surface of this glacier has a nearly uniform inclination of only  $3^{\circ}$ \*. It is certainly difficult to conceive that the mere effect of gravity upon a slope of this inclination, would be sufficient to overcome the enormous friction of ice upon such a bed. It must be remembered, however, that the inclination of the bottom probably much exceeds that of the surface at that part where the accumulation of ice is greatest, and the superficial inclination least. Thus, in the case before us, there is a difference of level of not less than 6000 or 7000 French feet between the commencement of the névé of the Aletsch glacier, on the slope of the Jungfrau, and the inferior extremity of the glacier. The distance between the two points may (by Weiss's map) be reckoned along the glacier at four Swiss leagues, or about 72,000 feet, consequently the mean slope, reckoning from rock to rock, is nearly 1 in 10—a very marked inclination, equal to the greatest degree of steepness admitted on the Simplon route, ( $5^{\circ} 42'$ .) Even this, however, is a feeble inclination compared with the enormous friction and adhesion which such a mass of ice, embayed in rocks, must present; and we hold this objection to be a very serious one to the hypothesis.

The contrary objection, urged by Charpentier, (p. 32,) against the theory of Saussure, is more unfounded. He asks, "What is the resistance which can maintain a glacier from sliding down a slope inclined  $45^{\circ}$ , in the case of the glaciers descending from the Dent du Midi?" We answer *friction*. Where the force of friction is equal to that of gravity, (no uncommon case,)  $45^{\circ}$  will be the angle of repose. Mr. G. Rennie found that the polished granite *voussoirs* of London Bridge only commenced slipping at an angle of  $33^{\circ}$  or  $34^{\circ}$ .†

Nor do we attach much importance to the objection of the same ingenious author, that the movement of glaciers is greatest in summer, and nothing in winter, though the pressure of snow is greatest at the

\* Elie de Beaumont, *Mémoires &c.* Tom. IV. p. 215, 223.

† Philosophical Transactions, 1829.



latter time. During winter the glacier is so thoroughly frozen by its edges, that it is inconceivable that it should then make any considerable progress, even though the base should remain partly free.

It is a serious difficulty in the gravitation theory, that the movements of glaciers do not appear to take place violently *per saltum*, as we should expect to be the case if they were due to the preponderance of gravity over friction. The relations of glaciers starting forwards several feet at a time, are generally considered apocryphal.—(Hugi, p. 368, and Agassiz.)

An objection which seems to us important against the theory of De Saussure, though we believe it has not been distinctly noticed, is the following:—If a glacier have no supply of material throughout its mass, but is exposed to all the influence of evaporations and thaw, which we know often diminish its thickness at the rate of a foot a-week, how comes the inclination of the surface to be so gentle as we generally find it, and the glacier to be so prolonged into the plains? If the glacier advance downwards, and at the same time diminish by its upper surface, it must continually tend to assume a wedge form, and to terminate by the meeting of its upper and lower surfaces. Perhaps, however, we shall not greatly err if we conceive the maximum effect of waste, or one foot per week, to continue for four months in the year, and that during the remaining eight the waste is insensible. We shall have sixteen feet of thickness lost in a year. Suppose that in the same time the glacier has advanced 320 feet longitudinally, the inclination of the surface *due to waste*, and independent of the trough of the glacier, would be only 1 in 28. But to this must be added the waste at the inferior surface.

We have said that it has generally been regarded as an essential part of the theory of De Saussure, that the inferior surface of the ice being continually melted by the heat of the earth, the sliding of the glacier along its bed is thereby facilitated. Now, one of the most delicate parts of the whole inquiry is, "What is the precise relation of the glacier to the supporting rocks?" No doubt, MM. De Charpentier and Agassiz have stated several reasons for supposing that the contact surface of the ice and rock will be always at a freezing temperature, and beyond a certain elevation above the sea, that it will be below that temperature; and they have supported their views by a citation of the respectable authority of Bischoff:—they have also thought themselves warranted to conclude that the ice is firmly frozen to its bed, which M. Agassiz (p. 161) considers necessary to explain the maintenance of a glacier in a deeply fissured state, where the pyramids of ice are almost separated from one another; and Charpentier (p. 95) derives it from the direct observations repeatedly made by M. Venetz on the glacier of Giétroz; and yet it seems never distinctly to have occurred to these gentlemen, that were the glacier *permanently* frozen to its bed, as they suppose, it is impossible that it should have a true progressive motion from any cause whatever—a fact which yet all admit.

"Such an adhesion," observes M. Agassiz, (p. 152,) "excludes at once all idea of sliding; and if, notwithstanding, a glacier falls forward, it can only be when the weight of the masses lying on an inclined plane overcomes their adhesion to the base. But how comes it, I shall be asked, that all the while it adheres to the soil on which it rests, a glacier is yet capable of advancing? This is what I shall endeavor to demonstrate."

It does not appear to us, however, that any thing like a demonstration follows. The question remains unanswered and unanswerable. There may be a force different from that of gravity which puts the glacier in motion—and that force may be the expansive action described by these authors; but come whence it will, this force succeeds in moving the glacier onwards, whilst the rock beneath it retains its place. Can this occur without the one surface becoming detached from the other? We apprehend not.

But what is most inconsistent is, that the motion of the glaciers on their rocky beds is just as distinctly insisted on and required, for the explanation of phenomena by the disciples of Charpentier, as by those of De Saussure. Charpentier combats (p. 105) the idea, that the *friction* between the ice and the bottom should exceed the expansive force which he ascribes to the glacier: in another place he says—"the movement impressed by the dilatation of the *WHOLE MASS* of the glacier occasions a friction so considerable against the rocks, (which form its bed and support it,) that the surface wears, is hollowed, becomes smooth, and takes even a slight polish, if the rock be, by its hardness, capable of receiving it," (p. 42.) And Agassiz speaks still more definitely of "the bed of mud and gravel which is intermediate between the glacier and its bed," (p. 194;) and of "the rounded pebbles upon which the glaciers move in their lower part," (p. 197.) We apprehend, therefore, that these advocates prove too much.

2. Let us now advert to the arguments which have been, or may be, urged against the dilatation theory of glacier motion, in which it is assumed that the structure of the ice being porous, and the superficial water being absorbed into the mass during the day, the water becomes frozen in the night, dilates, and pushes the glacier forward.

The first objection we shall mention is urged by M. Necker, in his zealous defence of the doctrine of his distinguished relative, De Saussure, in the work mentioned at the head of this article. He maintains that the supposed elongation would not be due to the *entire* expansion of the frozen infiltrated water, since the solid mass of ice, would, doubtless, extend laterally and vertically, as well as longitudinally.\*

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\* M. Agassiz had put the matter thus, "Comme le glacier est contenu des deux cotés par les flancs de la vallée, et en haut par le poids des masses supérieures, toute l'action de la dilatation se porte naturellement dans le sens de la pente, qui est le seul coté qui lui offre une libre issue, et vers lequel elle doit déjà tendre, en vertu de la loi de gravitation."—P. 165—6.

Admitting then, that water expands one-seventh of its volume in freezing, we are not to infer that the glacier would expand one-seventh of its length by the thaw and recongelation of its entire mass; for he says—"It would be to understand very imperfectly the nature and power of the molecular forces to suppose that the action of gravity can be an obstacle to them," (so that the glacier should only extend itself down the declivity. "Limited in its action to very small spaces, expansion like, crystallization, acts without regard to gravity, and we know that expansion particularly, exercises within small spaces a power almost irresistible."—Necker, p. 153.

This is perfectly true; but it does not at all follow that because dilatation is irresistible, the form of the mass shall be unchanged, or that it shall pay no regard to the direction in which gravity aids its motion. No doubt, if we regard a glacier as a perfectly *rigid* body, (which is a peculiar molecular condition wholly independent of the quality of expansibility,) it must preserve symmetry of form during dilatation—each dimension of length, breadth, and thickness, acquiring a *proper linear* increase. This, however, admitting for a moment the theory in other respects, is evidently *not* the characteristic of a glacier; which is of a consistence somewhat yielding, without which its progression would be in fact impossible, owing to the irregularities and contractions of the channel in which it moves. The plasticity of the whole would, therefore, we apprehend, throw the enlargement chiefly in a downward direction. Could we, however, suppose the dilatation to take place equally in all directions, we cannot even then coincide with the conclusion of M. Necker, that the increase of the whole Glacier du Bois would be "less than 6.83 feet in all directions." In the first place, the augmentation in length would of course, by its proportionality to the linear dimension, exceed that in breadth and thickness; and the amount would be nearly *one-third* of the cubical expansion, or more accurately one twenty-second of each dimension. Now, assuming with M. Necker the length of the Glacier du Bois to be 4000 toises, the expansion in length would be 182 toises, or 1092 French feet, by the recongelation of the whole ice in the glacier. We are unable to conjecture how the other palpably erroneous result has been obtained.

We could show, did space permit, that we do not consider the calculation by the same author, founded on the annual fall of rain and snow, conclusive against the dilatation theory; in which the water is not atmospheric water merely, but the matter of the glacier which goes again and again through the process of thawing and freezing.

The existence of vast *crevasses* dividing the ice into vertical segments, is an obvious difficulty in the theory of dilatation, being inconsistent with the general tension described (Charpentier, p. 12,) as being the immediate cause of motion. To this it may be replied with some show of reason, (Charp. p. 108,) that these *crevasses* never extend quite across and to the bottom of a glacier, but they occur partially and discontinuously, so as not to affect the rigidity of the whole glacier more than the slits do in a parchment sieve. On the other hand, on the theory of

Saussure, (and from what was even said above, we suspect upon any theory,) if the glacier move over its bed, we have only to suppose the lowest stratum of ice to be continuous, which in all probability it is, in order to be shoved downwards.

But there seem to us to be more formidable objections to the dilatation theory than any of these. This theory supposes the ice to be composed of fragments nicely wedged into one another; which fragments enlarge as they proceed from the *névé* to the lower part of the glacier. The water produced by rain or heat is absorbed into these fissures; on the return of night or drought it freezes, and expanding, urges the glacier bodily forward, occasioning likewise a growth in the directions of breadth and thickness. Now we find, in the first place, some difficulty in admitting the *universal* existence of the capillary fissures assumed. M. Agassiz, indeed, states their existence as general, (p. 163;) we confess, however, some skepticism on this point. The capillary fissures are only well shown where the ice surface is in contact with a mass of rock, whose varying temperature has no doubt fissured the neighboring ice. In some glaciers, such as that of Rosenlani, this structure is very beautifully developed;—the great irregular grains of the glacier lying wedged into one another, with water between, so curiously packed, that though they may be shaken in their places, it is often difficult to dissect them. We are, therefore, far from denying the existence of this granulated structure in *certain parts* of glaciers. We only hesitate to admit its presence throughout their mass. There is, however, a structure which may perhaps aid the theory more than the other somewhat problematical hypothesis—a structure so remarkable, that we are surprised to find no mention of it amongst the authorities we have cited.\* It is a ribboned texture of the ice, which seems in most glaciers disposed in bands nearly vertical, and throughout the greater part of the glacier very generally parallel with its length. This veined appearance, which is beautiful and striking, and which extends to to a great depth, is occasioned by the alternation of compact and porous ice in vertical laminæ side by side—generally less than one inch in thickness; and so well marked, that when the surface of the glacier is cut and polished by a water-course, it exhibits the appearance of the most delicately-veined chalcedony. In the sides of the great transverse *crevasses*, this structure is peculiarly evident from the greater or less persistence of the different veins. We hasten to add that it appears to have very little, if any thing, in common with *stratification* properly so called. But however caused, since these porous and compact layers are generally vertical or highly inclined, it is not unlikely that they form a system of filters, which allows some of the water to percolate from the upper to the lower parts of the ice.

Our *second* objection arises from the difficulty of conceiving capillary

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\* But more recently described in the *Edinburgh New Philosophical Journal*, for January, 1842.



fissures having their walls continually maintained at, or below  $0^{\circ}$  cent,\* into which water is to be drawn by capillary action, not only at the surface, but throughout the whole thickness of the ice, without being frozen in the very act.

Our *third* objection is—supposing these capillary fissures so filled during the day—how comes it that the water they contain is frozen during the night, not merely at the surface, but to great depths, where the effect of the diurnal changes of temperature cannot possibly arrive by conduction?† M. de Charpentier has stated this objection, (p. 104.) We own that his reply to it seems to us wholly unintelligible.‡

Our *fourth* objection would be, that if congelation *could* occur, the upper strata must be by far the most affected, the lower ones not at all. The motion would therefore be confined to the superficial part of the glacier. This reasoning is so fully admitted by Agassiz, that he has endeavored to make it a ground of proof in favor of his hypothesis, by maintaining§ that glaciers are stratified horizontally; and that these strata move with greater velocity in proportion as they are nearer the surface—each stratum having the motion proper to its own dilatation, superadded to the sum of the motions of the strata beneath. We are bound to state that the ingenious author seems to have erred in point of accuracy of observation. Such stratification does not exist, and it is accordingly denied by Charpentier, (p. 108, *note*.) If it existed, or if the upper portions moved faster than the lower, we should have phenomena wholly different from those observed. Were this true, no *crevasse* could remain vertical; the top of its advanced wall must move more rapidly than the base, and slope forward, while the posterior wall would overhang. No trace of a *general* law of this kind is to be found amongst the glaciers: if some *crevasses* appear to lean forwards, others lean backwards, and a majority are vertical.|| We hold this fact to be a strong argument against the dilatation theory.

A *fifth* difficulty is this: why do the *névés* not accumulate indefinitely? for if the glaciers move only by the swelling of their mass, the *névé* cannot literally be said to be the feeder of the glacier, the movement of which must be great just in proportion to its distance from its origin, (the *névé*.) If, then, in its upper part the glacier move little or nothing, the *névé*, which commences precisely where the winter snows never melt, what becomes of the accumulation of the winter snows?

\* Agassiz, p. 203. Charpentier, p. 10.

† In common soils the diurnal changes of temperature vanish at a depth of three or four feet.

‡ Feeling apparently its insufficiency, he has returned to it at page 307 of his work; but by insisting more strongly on the capillary nature of the infiltration, and the low temperature of the interior of the glacier, he only brings out the difficulties more prominently. But we must refer to the work itself.

§ Page 165-6.

|| M. Agassiz seems to have been partly misled by a figure of a glacier waterfall in Hugi's *Travels*, plate III. It is strange that he should have preferred the evidence of this single figure to all the direct observations which he has had such ample opportunities of making.

They do not fall downwards to fill up the progressive glacier, for the glacier at that point makes little or no progress. The glacier advances only in consequence of swelling or dilating, and consequently its movement depends at any point upon the length of the part whose dilatation produces the motion, which length is to be reckoned *from* the *névé*, for the dilatation vanishes where the *névé* begins. Instead, therefore, of the *névé* annually filling up the space by the progressive glacier, there is no space to be filled up at all; and the glacier must advance solely in consequence of the absorption of the dissolved snow, which falls upon its proper surface.

This important consideration suggests the *only* critical experiment we know of, for the discrimination of the true hypothesis. If Saussure's theory be true, the glacier moves onward, without sensibly incorporating new matter into its substance—continually fed by the supplies from behind which form a new and endless glacier. The mechanism may not inaptly be compared to that of the modern paper machine, which, from the gradually consolidated material of pulp, (representing the *névé*) at length discharges, in a perpetual flow, the snowy web. The theory of Charpentier, on the other hand, represents the fabrication of the glacier going on within the glacier itself, so that each part swells, and the dilatation of each is added to that which acted upon itself, in order to shove on the section of the ice immediately in advance. *In the former case, then, the distance between two determinate points of the glacier remains the same; in the latter, it will continually increase. Again, on the former hypothesis, the annual progress of any point of the glacier is independent of its position; on the latter, it increases with the distance from the origin, (the transverse section of the ice being the same.)* The solution of this important problem would be obtained by the correct measurement, at successive periods, of the spaces between points marked on insulated boulders on the glacier; or between the heads of pegs of considerable length, stuck into the matter of the ice, and by the determination of their annual progress.

In endeavoring to present a statement of the two prevalent theories of glacier motion, and the formidable difficulties which may be suggested to either, we are far from asserting that both are necessarily wrong, or that the difficulties we have stated are incapable of a reply. We incline to think the objections to Saussure's hypothesis are of a more *positive* kind, because the theory is more intelligible; and that the other, which calls into play a *kind* of force (dilatation) very likely, from its great energy, to produce the effect in question, addresses itself in some degree to our ignorance, and therefore the objections to it retain a somewhat ambiguous character. This arises particularly from our ignorance of the habitudes of a fluid *about to freeze*—of the very minute circumstances which retard or accelerate congelation, and of the distances through which these causes may energetically act. Still less do we know the influence of the capillarity of the fissures under such circumstances. We are not disposed to accept as demonstrative the experiments yet made on the percolation of water in the mass of ice, or even

the existence of the network of fissures, presumed to traverse the most compact glacier ice. The absorption of colored fluids would appear to be one method of determining the amount and direction of such percolation. The experiment has not yet been made to our entire satisfaction.

We had intended to have explained the dependence of the direction of fissures upon the form and motion of the glacier, and the not less remarkable relation which appears to subsist between these and the varied structure of the ice; but our space does not admit of it. We will, therefore, conclude this part of the subject with the following very just remarks of Charpentier—

“Since the time of M. De Saussure, the knowledge of glaciers has made but little progress. The subject seemed to have been exhausted, and that there remained nothing to add—nothing to modify—nothing to correct. A great number, perhaps most, geologists, and many philosophers and men of science, have visited and still visit the glaciers; but very few amongst them have made them an object of study. The reason is simple, arising on the one hand from the remoteness of the glacier localities, and on the other from the number and variety of interesting objects there to be met with. \* \* \* The intelligent and observing foreigner, arriving for the first time amongst the higher Alps, finds, at every step, something which strikes and interests him, and which distracts his attention; whilst the inhabitant of the Alps, more familiarized with their sublime scenery and remarkable productions, is in a better state for directing and concentrating his attention upon a special object.”—(*Essai*, p. 352.)

We now turn to the last division of our subject—the application which has lately been made of the phenomena of glaciers to account for certain changes on the earth's surface, which have occurred even in places where glaciers now no longer exist. The great phenomenon for the explanation of which this theory of the ancient extension of glaciers has been contrived, is the distribution of erratic blocks over ranges of country where the material, or rock, of which the blocks are composed, is nowhere to be found *in situ*.

The geological divisions of the latest deposits found on the earth's surface, are not very uniform or consistent in different works. The first volume of Professor Necker,\* the amiable and accomplished geologist of Geneva, contains a clear and tolerable detailed statement of the aspect which they assume in the country of which we shall chiefly have to speak; namely, the flat, or undulating tract intervening between the foot of the Alps, and that of the Jura range. The ordinary divisions of these superficial formations into two; the *alluvium*, which contains evidence, both zoological and mechanical, of having been produced in the present age of the world, whilst the same species lived, and the

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\* Etudes Geologiques dans les Alpes.

same abrading and depositing causes acted as now ; and the *diluvium* or "boulder formation," "terrain erratique" of continental geologists, "drift," of England, and "till" of Scotland, differing from the former in the species of contained fossils, many of which are extinct, or belong only to distant regions of the globe. The diluvium is rarely, if at all stratified ; the super-position of blocks, gravel and mud, is without order ; and the blocks are often enormous and angular. The reverse features characterize the alluvium. M. Necker divides the older or diluvial formation into two—the unstratified or cataclysmal diluvium ; and one inferior to it, which is stratified and devoid of huge angular fragments ; and which, by its structure, resembles the modern alluvium, from which, however, it is separated by the entire "boulder formation :"—this he terms the "old alluvium."

"The ancient alluvial formation," he says, "is formed by rounded pebbles of gravel and sand, more or less fine. The pebbles have in general a magnitude which varies from the size of an egg to that of the fist, and which never attains the size of the head. They are perfectly smoothed, and often a little flattened, like those which are found on the shores of a lake. They form horizontal beds, sometimes of a thickness of several toises, now and then irregularly alternating with beds of gravel and sand, shorter and thicker, and having a lenticular form. The disposition of these beds is entirely similar, although on a greater scale, to those of the existing alluvia of the Arve and the Rhone."—(*Etudes dans les Alpes*, p. 233.)

Hence, to explain these facts, it is supposed that no cause materially differing from those now in action requires to be invoked. But with the proper diluvium it is different ; no geologist has been able entirely to disguise the necessity of having recourse to an energy greater than is now to be found on the earth's surface—

"The masses are without any apparent order, in which materials of all sizes, from the most enormous blocks to the finest mud, are mixed and confounded together, so as to lead us to presume that only a terrible cataclysm could have produced a deposit so deep, and of such a structure."—(*Ibid.* p. 232.)

And again—

"Although the great blocks form a part of a mass composed chiefly of small debris, yet, as it is the mass of these blocks which determines the *minimum* intensity required for the force which has transported the whole, we may, without disadvantage, in order to have the principal data of the problem, neglect all the debris of smaller dimensions, and consider the blocks alone. In fact, the existence of these blocks commands the whole question : for had these masses been, like the ancient *alluvium* composed of gravel and pebbles, we should naturally have sought (as for the latter) no causes differing in kind from our existing torrents and rivers, though perhaps more powerful."—(*Ibid.* p. 351-2.)



This is a perfectly fair statement of the question, and it is scarcely possible to convey to one who has not seen the "boulder formation" or "cataclysmal diluvium" in its full development, (as, for instance, on the flanks of the Jura range, above Neufchatel and facing the Alps,) an adequate notion of the wonderful phenomenon to be explained.

A great part of the plain of Switzerland, as of many other large and nearly level tracts, is covered at intervals by fragments of travelled rocks, the greater part of which owe their origin to the higher Alpine tracts, as their mineralogical character unequivocally indicates. Amongst the rolled and rounded pebbles of smaller size, we find, indeed, many specimens whose origin may be stated to be completely unknown; further than that they have evidently been detached from one of the conglomerate formations which occur so plentifully on the northern side of the Alps. It is one of the real "wonders of geology," the occurrence of those pebbles derived from the trituration of rocks which can no longer be identified, which in a former age of the world yielded the boulders of the "alluvium" of that period—became consolidated into rock—and now, by a fresh revolution, are tossed and ground by modern rivers, and mix again with our superficial deposits. The most important masses, however, are those which attain a considerable size—*metrical* blocks, as they have been termed—that is, having about a cubic yard of contents, which strew the plain, dot the sides of the Alpine ravines, and rise even to an elevation of several thousand feet above the sea upon the opposite flank of the Jura range, where not one fragment of a primitive rock is to be found *in situ*. The most concentrated distribution of erratics is to be found about Neufchatel, at a height of 800 or 900 feet above the lake of that name, in the valley of Switzerland. Similar masses are found on the summit of the Mount Saleve, at a great height above the lake of Geneva, and insulated from the general group of Alps. It is perhaps difficult to convey upon paper too lively an impression of the singularity of the phenomenon—a belt of fragmentary masses lying on a steep, almost precipitous slope, of nearly bare or thinly-covered rock, of a nature wholly dissimilar; not few nor small, but countless as gigantic. The Pierre à Bot, (*toad-stone*), 850 feet above Neufchatel, has a length of between fifty and sixty feet, a breadth of twenty, and a height of above forty. It is of granite, and distant in a *right line* from its supposed origin in the Val Ferret, to the east of Mont Blanc, seventy English miles. Now, observing that this is no individual case, and that many other blocks, if not so large, yet comparable to it in size, are to be found on the Jura, and that those of one or two cubic yards and under are really innumerable; further, that between the Jura and the higher Alps, blocks *still larger* are in many places to be found, as at Steinhof in the canton Berne, (one out of a great number together measuring 61,000 cubic feet,) we perceive the *vast extent and measure* of the phenomenon to be explained;—enough, alone and at once to overturn any hypothesis as to the omnipotence of causes now in action, unmodified in intensity, however long continued.

It is quite needless to enter into a detail of all the explanations which have been proposed of these wonderful facts, stumbling-blocks on the very threshold of the structure which geology designs to explore. A detail of them, and a clear statement of some of the many objections which may be urged against each, is to be found in Charpentier's lucid essay on glaciers. Of the former theories of transport, that of the action of prodigious "diluvial" currents is the one supported by the greatest amount of authority; and when we cite the names of De Saussure, Von Buch, and Sir James Hall, our readers will perceive that the authority is enforced by its weight as well as its generality. Playfair, indeed, in the very face of far abler arguments adduced by himself, asserted that the boulders on the Mont Saleve, near Geneva, might have been transported by the river Arve when it flowed at a higher level,\*—a piece of ultra-Huttonianism which he could scarcely have maintained had he visited the locality. But in the same memorable work in which he hazarded this assertion, we find an indication of a cause, far more adequate as well as more original, in the extension of glaciers as agents of transport. This indication, which forms part of the very able note on the *transportation of stones*, in the "Illustrations of the Huttonian Theory," is neither vague nor indirect. It is put forward as the most probable explanation of all cases of transport where immense power was obviously required :—

"For the moving of large masses of rock," says Professor Playfair, "THE MOST POWERFUL AGENTS WITHOUT DOUBT WHICH NATURE EMPLOYS ARE THE GLACIERS, those lakes or rivers of ice which are formed in the highest valleys of the Alps, and other mountains of the first order. These great masses are in perpetual motion, undermined by the influx of heat from the earth, and impelled down the declivities on which they rest by their own enormous weight, together with that of the innumerable fragments of rock with which they are loaded: These fragments they gradually transport to their utmost boundaries, where a formidable wall ascertains the magnitude, and attests the force, of the great engine by which it was erected. The immense quantity and size of the rocks thus transported, have been remarked with astonishment by every observer, and explain sufficiently how fragments of rock may be put in motion even where there is but little declivity, and where the actual surface of the ground is considerably uneven. In this manner, before the valleys were cut out in the form they now are, and where the mountains were still more elevated, huge fragments of rock may have been carried to a great distance; and it is not wonderful if these same masses, greatly diminished in size, and reduced to gravel or sand, have reached the shores, or even the bottom of the sea. NEXT IN FORCE TO THE GLACIERS, the torrents are the most powerful instruments employed in the transportation of stones," &c.—(*Huttonian Theory*, Art. 349.)

Now, as the passage immediately preceding that we have quoted

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\* *Huttonian Theory*, in his Works, I. 398.

contains a statement of the problematical facts mentioned above, respecting the distribution of the travelled blocks in the plains of Switzerland and on the Jura, we cannot but give to Professor Playfair the credit of having clearly pointed out the probability of the former greater extension of glaciers, as THE MOST POWERFUL known agents of transport. This was in the year 1802, before the author had had the opportunity of personally estimating the applicability of the theory to phenomena. The passage from the notes of his journey in 1816, quoted in this Journal, (Vol. LXIX. page 420,) and more lately by Charpentier, shows that his views in this respect had undergone no change in the interval, and were only confirmed by an inspection of the erratic blocks on the Jura, which he unhesitatingly ascribes to the former existence of glaciers which once *crossed* the lake of Geneva and the plain of Switzerland. Rivers like the Arve he no longer considers adequate agents, nor even currents of water, however great, as in the *debacle* of De Saussure. "A current of water," he says, "however powerful, could never have carried it (the Pierre à Bot, near Neufchatel) up an acclivity, but would have deposited it in the first valley it came to, and would in a much less distance have rounded its angles, and given to it the shape so characteristic of stones subjected to the action of water. A glacier which fills up valleys in its course, and which conveys rocks on its surface free from attrition, is the ONLY AGENT we now see capable of transporting them to such a distance, without destroying that sharpness of the angles so distinctive of these masses."\*

Like many other anticipations of new theories, these pointed and just observations of Professor Playfair lay dormant until the opinion he advanced had been separately originated and discussed. M. Venetz, an intelligent engineer of the canton of Valais, speculating upon the irregular periods of increase and decrease of glaciers, collected partly from history and partly from tradition, a variety of curious and distinct facts bearing upon these oscillations of the great glaciers of the Alps. He united them with judgment and impartiality in a Memoir which we have cited at the head of this article—which was read in 1821 to the Swiss Natural History Society, and published in the second part of the first volume of their transactions. In this paper M. Venetz classifies separately the facts which prove an increase, and those showing a decrease of glaciers in modern times. The former are certainly the most remarkable—showing that passes the most inaccessible, traversed now, perhaps, but a few times in a century, were frequently passed on foot, sometimes on horseback, between the eleventh and fifteenth centuries. Thus the Protestants of the Haut Valais took their children across what is now the Great Glacier of Aletsch to Grindelwald for baptism; and at the same period horses passed the Monte Moro from Saas into Italy; and the peasantry of Zermatt, at the foot of the Monte Rosa, went annually in procession through the Eringer Thal to Sion,

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\* Playfair's Works, I. p. xxix.

by a pass which few inhabitants of either valley would now venture to attempt. We regard these facts, not as forming any proof of the former great extension which carried the glaciers even over to the Jura, but as evidencing one only of many oscillations which the glacier boundaries have undergone ; and as important in showing that a *very notable* enlargement of these boundaries was consistent with the limits of atmospheric temperature, which we know the European climate has not materially overpassed within historic times. It may not, therefore, require so violent a depression of temperature as we might at first sight suppose, to account for any extension of the glaciers which the facts may require us to admit. The causes of these oscillations are as yet very obscure. We have purposely refrained (for the sake of conciseness) from analyzing the theories which have been given, because we find them all unsatisfactory.

M. Venetz has further, in his Memoir, pointed out certain ancient moraines, belonging to modern glaciers, which indicate their previously greater extension ; an evidence which had formerly been accepted by Saussure, especially in the case of the Glacier de Bois at Chamouni,\* and that of the Rhone.† The remark is important, because it requires us to investigate the character of a moraine, so as to recognize it wherever it may be found.

It does not appear that M. Venetz has published any other Memoir on the subject of glaciers ; but it is quite certain that he was the first person publicly to maintain in Switzerland the doctrine of the former extension of the glaciers to the Jura, as the transporting agents of the erratics. The writer of this article was introduced to M. Venetz in 1832, as the man who had originated a speculation, which, though it had not, perhaps, then another advocate, was acknowledged to be novel, ingenious, and bold ; and the reputation which the author of it had acquired, as the intrepid and skilful engineer of the works on the glacier of Giétroz, (the cause of inundations which threatened the town of Martigny with destruction,) gave it a consequence which might not otherwise have been conceded to it.

The first important convert to the new theory was M. de Charpentier, a mineralogist and geologist of reputation, author (amongst other works) of a geognostical essay on the Pyrenees, not even yet superceded. He undertook the examination of the question with the determination to disabuse his friend Venetz of the geological heresy he began to maintain, of the existence of ancient glaciers sixty leagues in length, at a period which was generally admitted to have afforded in Europe a climate adapted for the palm-tree and elephant.‡ The learned mineralogist, however, when he came to examine the evidence, found that he had "*caught a Tartar*;" he bowed under the yoke of glaciers, and announced his conversion in an interesting article, read to the Swiss Natural History Society in 1834, published in the 8th volume of the

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\* Voyages, § 623.

† Do. § 1722.

‡ Charpentier, *Essai*, page 243.



*Annales des Mines*, and distributed to his scientific friends. In this short memoir of nineteen pages, we find the germ of almost all the arguments since employed in support of the glacier theory. The conveyance of great masses of rock to a distance from their origin, (page 4,) without any *sorting* or arrangement according to volume: the separation of deposits derived from different sources, not confusedly mingled, but deposited at certain levels, and leaving spaces wholly untouched, (pp. 6, 7, 14 :) the occurrence of a group of rocks together, of the same nature, derived from a single *eboulement* on the surface of the glacier, (p. 14 :) the elevation of the blocks on the Jura, (p. 17 :) the partially rounded (*emoussé*) character of the angular blocks, showing friction, though evidently not waterworn, (p. 12 :) the non-occurrence of erratics in the equatorial regions of the globe, (note, p. 16 :) the polished surfaces of the fixed rocks, not only of the bottom of valleys, but the elevated flanks and even *cols* of mountain-chains, over which a *debacle* carrying stones and gravel could not possibly have passed, (p. 8, 9 :) the grooves which are met with in such surfaces, called *karren* (in German Switzerland :)—all these varied facts are cited in support of the Glacier Theory. In particular, he attributes the abrasion and polish of the fixed rocks to the pressure of the enormous weight of glaciers upon their beds, in the following passage :—

“We know that the glaciers rub, wear, and polish, the rocks with which they are in contact. Struggling to dilate they follow all the sinuosities, and press and mould themselves into all the hollows and excavations they can reach, polishing *even overhanging* surfaces, which a current of water, hurrying stones along with it, could not effect.”—Charpentier, *Mémoire*, p. 15.)

This is important, being, as M. Agassiz has remarked,\* perhaps the first clear notice of this function of existing glaciers. M. de Charpentier attributes the cold of the glacier period to the greater height which the Alps then attained, on their first elevation—an opinion which he has since abandoned. Charpentier's publication, though not unknown to geologists, was received with cold neglect. He employed none of the received methods of *agitating* a theory into vogue. The speech of the President of the Geological Society of London for 1836, contains a distinct citation of his views without a word of comment.†

In 1836, Professor Agassiz repeated with respect to M. de Charpentier what had passed between the latter and M. Venetz. He went to Bex to meet him on his own ground, and to convict him of his errors;‡ but he, too, gradually yielded to the evidences before him, which he found to be so plain in the lower valley of the Rhone, that he adopted at once the theory of the ancient extension of glaciers. Returning home to Neufchatel, he examined the polished surfaces of calcareous

\* *Etudes*, p. 190.

† See *Philosophical Magazine*, 3d series, viii. 338.

‡ *Etudes sur les Glaciers*, p. 15.

rock, locally termed *Laves*, which had been previously described ; in which he found a new confirmation of the theory of Venetz, and he published this result, together with his adhesion to the *general* facts of the glacier theory, in a discourse read to the Swiss Society of Naturalists, in 1837. In this pamphlet he discusses the objections to previous theories, and expresses an opinion that the icy slopes down which the Jura blocks come, formed part of a coating or crust of ice which covered Switzerland previous to the elevation of the Alps ; and on which the rocky masses, detached during the convulsion producing the elevation, slid down by gravity. This hypothesis appears to be rather a retrograde step in the progress of a just theory, for it admits of refutation alike on geological and mechanical principles.

The lively discussion to which these opinions gave rise in Switzerland, naturally induced the promoters of them to lay the evidence for them in a more connected and demonstrative form before the scientific world, who, in uncertain sciences like geology, are slowly led to accept any opinion, unless sanctioned by the *highest* authority ; so that the names of Charpentier and Agassiz could scarcely save from ridicule a theory opposed in some respects to the prejudices of mankind and the existing opinion of geologists, and which had not then, nor, we believe, even now, received a passport to public acceptance of the support of Von Buch, Von Humboldt, and De Beaumont.

Within not many months of each other, appeared the volumes of Charpentier and of Agassiz on the glacier theory, each being the extension of the previous notice or programme already referred to. The work of the latter appeared the earliest in point of time, but there can be no doubt that the two were simultaneously composed ; and as Agassiz has honorably acknowledged his debt to Charpentier and Venetz, for principles which he has only followed out and endeavored to extend more widely, a few ambiguities which occur as to originality are of the less consequence.

The *Etudes sur les Glaciers* of Agassiz, is a work written in many parts with ease and spirit—in many, it is obscurely expressed and deficient in method—and in some betrays evident marks of haste, as well in reasoning as in composition. As a literary production, we own that, considering the celebrity of the author, and his happy talent for oral exposition, we were disappointed with it. Educated and esteemed as a pure naturalist, the very skill and force of imagination which recommended him when a very young man to the illustrious Cuvier, as fittest for the task of completing his investigation of fossil species, seem to interfere with the calmness of judgment, the severity of reasoning, and the formation of general views, which should characterize the reasoner on physical geology. A second edition must materially improve the work, and give it more the character of a consolidated, consistently argued, analysis of facts ; in which it is so far deficient, that we can hardly persuade ourselves that it is entirely the production of one hand. One of its distinctive recommendations is the Atlas of Plates, which, by their admirable execution, and ample explanatory sketches, serve to

convey in a short time, to an entire stranger, a fair idea of the facts to be explained, and the chief evidences of the theory. A good commentary on the plates would perhaps have made a more persuasive volume than that which has been written apparently with little or no reference to the atlas which accompanies it, and to which allusions are infrequent. In endeavoring to seize the arguments so ably conveyed to the eye, the reader's natural question would be, whether the plates may be depended upon—whether the features on which the author dwells are not exaggerated? We can assure him, that in all *essential* details they are exact, and this being admitted, the body of evidence they afford is very powerful indeed. The points of view are generally well chosen, and the execution is admirable, being conducted under the author's eye in a lithographic institution, which owes its origin, we believe, to his zeal and enterprise. The letter-press is swelled by some bulky citations, as those upon red snow and the Siberian mammoths; whilst details of great importance are slightly passed over or omitted—as those which refer to the evidence of moraines and glacier polish in the lateral valleys of the Alps. These imperfections we mention, in the hope of seeing them amended in the new edition, which must soon be called for, of this popular work, which appeared simultaneously in French and German, and which has had an extensive circulation.\*

The first and larger portion of the volume refers to the mechanism of existing glaciers, of which we have already given a full account: a chapter is then added on the oscillations of their dimensions in historic times, chiefly on the authority of Venetz; another on the ancient extension of glaciers on the Alps; and one more on the former existence of extensive sheets of ice over different parts of the earth's surface, marked by phenomena similar to those described by Charpentier. It is upon this last chapter the author chiefly rests his claim to originality in these investigations; and when we recollect that the phenomenon of erratics is not a local but a widely distributed one, we admit the importance of the extension of the reasoning, at the same time that we feel the necessity of proportional caution in the acceptance of the evidence. And it is certainly unfortunate that this part of the work, which Mr. Maclaren, in his neat summary of the glacier theory, has justly characterized as obscure, should be founded on an explanation of the distribution of erratics certainly erroneous, (that which supposes them due to the elevation of the Alps;) and that the author should have predicted the phenomena which he had yet to discover in Northern Europe, and especially in Scotland. On the other hand, it is to be observed, that in applying Charpentier's theory of the dilatation of glaciers to extended sheets of ice, he rendered *conceivable*, at least, the existence and extension of glaciers in circumstances where they could not otherwise have occurred. We shall return presently to the phenomena of the Scandinavian boulder-flood.

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\* An excellent analysis of this work has been printed (privately, we believe) by Mr. Maclaren, of Edinburgh.

The work of Charpentier entitled, *Essai sur les Glaciers, et sur le Terrain Erratique du Bassin du Rhone*, though the preface is dated in October, 1840, only made its appearance last summer, (1841.) It treats substantially of the same facts, and in the same order with the work of Agassiz, but it wants the fine illustrative plates. On the other hand, it is distinguished by simplicity, method, and clearness—in a word, by careful composition. The sections are short—the arguments distinctly stated, and the answer placed directly against the objection. The criticisms are usually, we think, sound, although the original speculations are not always tenable. Charpentier's book, and Agassiz' atlas, will readily initiate the reader into the past and present mysteries of glaciers. The second and larger part of this work is occupied with the theory of erratics, in which the older hypotheses are successively discussed, the glacier theory explained, and the most probable objections answered. As might be expected, the most theoretical part we find to be the least plausible; and the author's theory of the cold of the glacial period, we think rather more objectionable than his older one, of the greater primitive elevation of the Alps. We approve of the caution which has generally confined the speculations of M. de Charpentier to the origin of those boulders with which he was best acquainted—namely, those of the valley of the Rhone and the opposed flank of the Jura; but he cannot be censured for omitting all reference to the cause of boulder formations generally; in his first publication, already analyzed, he had remarked the deficiency of erratic blocks in tropical regions; and in the volume before us he specifies the cases to which glacier action might be extended.

The interesting work of Professor Necker, of Geneva, the learned and ingenious descendant of De Saussure, is the first of a series of volumes on the geology of the Alps, to the continuation of which we look with no common interest. We have cited it only because, treating as it does of superficial deposits, it refers frequently to the diluvial formations, and urges forcibly several objections to the modern theory—the author attaching himself to the hypothesis of a *debacle*. No detailed analysis can therefore here be given of the work itself. It is written in that graphic style which imparts even to the most minute details, and petty catastrophes, a real and scientific interest. The author is one of those meditative men, who, having gone through life with their eyes open, find every where a lesson of nature's teaching, and acquire knowledge, not so much from books as from events.

It now remains that we attempt to state some of the arguments upon which has been founded the admission of extensive glaciers, as amongst the latest agents which have modified the surface of Switzerland; we shall then state the more plausible objections which may be urged against it—some of which may be met with satisfactory answers, and others await further explanation.

I. AND FIRST of the occurrence of angular boulders. The great blocks on the Jura and inferior Alps have been literally amongst the greatest *stumbling stones* of modern geologists. We fairly own that



the arguments of the glacier theorists in favor of their being nothing else than ancient moraines, have scarcely struck us so strongly as the total weakness of the arguments of their opponents and predecessors, who have striven to prove them something else. The absurdity of some of these hypotheses is scarcely credible; the elder Deluc's, for instance, who supposed them the remains of primitive strata still resting in place, above the Jura limestone;\* or that of Deluc the nephew, who supposed them the result of volcanic projection from the higher Alps; and of Dolomieu, that inclined planes of *debris* extended once from the summit of the Alps, up to a certain height on the Jura, of which not a trace now remains, but down which the blocks had rolled by gravity, (though this inclination could not have exceeded  $2^{\circ}$ .) Then came the theory of diluvial currents, which is perhaps tacitly accepted by most geologists at the present day, notwithstanding the inconceivable postulates which it requires. Saussure's idea appears to have been, that the currents which moved the rocks were occasioned by the rupture of barriers which confined the water in lakes; and which then, rushing towards its escape, carried down in the flood the masses which a simultaneous convulsion had torn from the Alpine summits. If this seems plausible on paper, we cannot conceive any one gravely maintaining it when he stands beside the *Pierre à Bot*, which is as large as an ordinary house, overhangs the valley by a declivity of 800 feet, and is seventy miles distant from its origin between Mont Blanc and the great St. Bernard. Von Buch has very well shown† that the arrival of such a block in its present position pre-supposes its being carried forward, notwithstanding its prodigious mass, by a current of water, which AT ONCE gave it a projectile velocity sufficient to cause it to make a *flying leap* across the valley of Switzerland, so that it reached Neufchatel *before it had time to fall by gravity into the lake of Geneva!*—a velocity, which he took the trouble to compute, must have carried it over this enormous space in eighteen seconds, or at the rate of more than 20,000 feet per second! He afterwards indeed managed to reduce this velocity to a comparatively small one, on taking into account the buoyancy caused by the water; but it is not worth while to stop to explain the grievous errors in mechanical reasoning, into which the great geologist has fallen in this amended calculation;—errors which in fact leave the result worse than before.‡ With respect to this argument (if common sense afford not a sufficient reply) we ask merely—1, where have we evidence that water ever moved a stone, large or small, with a tenth part of the required velocity? and 2, if this block, the size of a dwelling-house, rattled on the bare Jura limestone with a rapidity ten times that of a musket ball at first firing, why was it not dashed into a million of

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\* Cited in the *Annales de Chimie*, tom. x. (1819,) p. 242.

† Ueber die Ursache der Verbreitung grosser Alpengeschiebe.—*Berlin Memoirs*, 1811, page 183.

‡ *Annales de Chimie*, x. 250. It is in the estimation of the terminal velocity that the error lies.

fragments? We may disguise, but nothing can elude these unanswerable objections, to which we might add many others—especially those arising from the distribution of the blocks.

The hypothesis of currents appears to have been adopted by Von Buch and M. Elie de Beaumont.\* The former attributes their origin, not to the rupture of lakes, but (so far as we understand his expressions) to the sudden elevation of the Alps. De Beaumont, on the other hand, finds the melting of ancient glaciers a sufficient cause. Having admitted the glaciers, we think he might have dispensed with melting them. Nor can we by any means allow the new arguments by which M. Necker maintains the theory of the *debacle*, although his treatment of the subject is well calculated to throw light upon it. *He admits a period of cold* and of enlarged glaciers, which he attributes to the great elevation of the Alps at that period, (*Etudes Geologiques*, p. 385.) These glaciers, forming barriers, produced lakes, which, bursting, carried down fragments of the neighboring rocks; and, according to the author, the rocks which received the first impulse from the water, retaining it longest, moved further than those which were caught up by the stream at an inferior part of its course, (p. 356.) Hence he explains the greater abundance of the primitive rocks at the more distant points. We own it would rather seem to us that whatever tended to diminish the velocity of the stream, must, *a fortiori*, diminish that of the blocks carried along with it, and that the largest must come soonest to rest. We have already observed that one of the most extraordinary facts about the erratic deposit is, that the blocks are in no way *sorted*; the largest lie with the smallest, at the greatest as well as at the least distances from their origin—a pretty clear proof that the cause of motion was *not one diminishing in intensity as it advanced*.

The most plausible of all the older explanations was undoubtedly that of rafts of ice, adopted by Sir James Hall,\* which, detached from adhering glaciers, bore across an inland lake the fragments with which they were charged, as at present occurs in the icebergs of the Arctic Seas. The main objections lie, 1. In the want of evidence of such vast inland lakes; for if any thing be proved about the erratic formation, it is, that it was deposited when the surface of the soil had taken very nearly its present configuration.† 2. The climate, if capable of maintaining ice-rafts on a lake which filled the plain of Switzerland, might equally have maintained glaciers, which account directly for the phenomena. 3. The blocks are deposited in a certain orderly manner;—the shower of blocks (if we may use the phrase) being deposited on the Jura, nearly or exactly opposite to their points of origin in the Alps; whereas the icebergs must have floated hither and thither, and been wrecked indiscriminately in all directions. Also, the blocks would have been deposited in a horizontal line on the shore of the lake, which

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\* *Edinburgh Transactions*, vii. 158. It was, we believe, suggested by Bergmann.

† Necker, p. 347.

is not the fact. 4. The theory is still more incompatible with the position of enormous blocks which lie at great heights within the Alpine valleys, and generally on their slopes, and not in the river-courses. The nearer we approach the origin of the erratics, the higher, generally, is the level at which they are found. The blocks from the higher Alps usually occupy the highest positions on the Jura, whilst the limestone of the inferior Alps forms a lower band. The theory of floating ice has been adopted by many authors, amongst others by Venturi,\* Darwin,† and Lyell.‡

Now, if we contrast with these theories that which supposes the existence of glaciers so extensive as to reach from the Alps to the Jura, we shall find that, startling as the proposition may at first sight appear, it is beset by fewer and less formidable difficulties than any we have mentioned; and we shall endeavor, by expressing the facts to be explained in the words of the opponents of the theory, and of those who never heard of the theory at all, to show that it possesses some remarkable features of truth.

i. It accounts for the transport of blocks of *any* size. No mass is too weighty for the strength of a glacier. A leaf or a pebble (as we have shown above) is more liable to sink into it than a block of 100,000 cubic feet. This is too notorious to require further proof. Saussure cites the glacier of Miage as presenting one mass of *debris* on its surface, and we have seen the glacier of Zmutt, beneath the Mont Cervin, in the same condition. We have likewise seen, on a modern glacier, a moving block at least eighty feet long, twenty broad, and forty high. So unfounded was the assertion of Agassiz, in 1837, that the blocks on the Jura are *larger* and more rounded than those found on the glaciers; a conclusion which led him, at that period, to deny the extension of glaciers (but admitting an inclined plane of ice) to the Jura, which he declared to contain no moraines.—(*Discours*, 1837, p. xvii.)

ii. The appearance of the blocks, as to angularity, is exactly that of the blocks which form moraines. We cannot quote a more unquestionable authority than that of Professor Necker, an opponent of the glacier theory:—

“The form of the diluvial blocks is the same as that of the blocks brought down by the glaciers, and which they deposit on their moraines. Like these, without being generally quite round, they have their corners and edges so ground away, (*emoussés*,) that we cannot doubt but they have suffered a prolonged friction.”—(Necker, p. 348.)

The larger blocks, we must add, whether on the glaciers or on the Jura, have their angles best preserved.

iii. The erratic blocks found most abundantly on the Jura, are deriv-

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\* In a *Memoir* cited by Charpentier, p. 189.

† *Voyages of the Adventure and Beagle*, iii. 288.

‡ *Principles*, 1st edition, vol. iii p. 150, (1833.) *Elements*, vol. i. p. 250, (1841.)

ed from that part of the Alpine chain where glaciers still act with intense force; and where the rock is so destructible, that blocks are yearly furnished by the present diminutive glaciers, undistinguishable in mass or material from those which a prolongation of the icy railroad stranded *first* on the steep sides of the winding valley of the Drance and the Rhone, and *finally* on the directly opposed surface of the Jura hills. It is from the glacier of Ornex, in the Val Ferret, to the east of Mont Blanc, that the masses appear to have been derived. This at least is the opinion of Von Buch, who has given an animated description of the scene :—

“Opposite the immense glacier of Ornex, one of the largest in the whole chain of Mont Blanc, the fallen fragments become like rocks, and the moraine lies like a little mountain across the valley. Glaciers tumble on glaciers down the valley; they have torn deep fissures in its walls, through which numberless blocks are continually thrown from the heights above, and beyond which, ever new rocky peaks seem to rise from the great ice field.”—(Von Buch, *Berlin Mem.*, p. 173.)

iv. The blocks carried down the Alpine valleys lie, as we have observed, not on the bottoms where gravity would have placed them, but often at the heights of 1000, 1500, or even 2000 feet above the level of the river—on ledges, and even projecting points of rock, surmounting precipices where it is hardly conceivable that water should have carried them. We admit that currents are very fantastic in this respect; but ice, either floating or in a glacier, could alone have perched them at these elevations. Such deposits were noticed in the valley of the Drance by De Saussure, (derived from the glacier of Ornex;) in many parts of the Rhone valley, by Von Buch; near Bex, by Charpentier; and in the valley of Hasli, near Meyrigen, at a great height above the Aar, by Agassiz. Sometimes the non-appearance of blocks is as strong an evidence of the glacier theory as their occurrence. Thus, the best-characterized rock in the whole Alps is the euphotide of Saas, near Monte Rosa, which is found in many parts of the plain of Switzerland: nevertheless its fragments do *not* appear\* in the great Rhone valley, which it joins at a right angle, and which must have infallibly been the case had they been brought down by currents. As they probably formed a medial moraine, they might have travelled indefinitely far on the surface of a glacier, without leaving a trace after its disappearance.

v. The actual distribution of blocks on the Jura and on the plain of Switzerland, is as yet but imperfectly known. Little, in fact, has been added to the masterly sketch of Von Buch, written thirty years ago, on this subject;—one on which his profound knowledge of the mineral characters of rocks entitles his opinion to great weight. On many points, no doubt, his statements may require modification; but, speaking broadly, the following three great characteristics of the distribution of the Jura

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\* Charpentier.



blocks obtain :—(a) The valleys in the Jura, screened from a view of the Alps, do not generally contain many erratics, which are found expended on the face of the hills fronting the Alps. (b) The rocks from the higher Alps (as the granites of Ornex) lie on the higher part of the Jura ; those from the inferior chain occupy the base of the hill and the plain, (as the pudding-stones of Valorsine.) This is reasonably attributed, on the glacier theory, to the retreating position of the terminal moraine, which at first, when the icy crust was thickest, was derived entirely from the highest Alps ; but as the effect of climate gradually restricted its limits, its surface followed the windings of the Rhone valley, and brought down the bounding rocks. (c) Each of the great valleys of the Rhone, the Aar, the Reuss, &c., seems to have discharged from its mouth a torrent of blocks, which spread themselves fan-like from the embouchure of the valley, being most thickly strewed, and likewise attaining the greatest height, exactly opposite to its mouth. Now this is precisely the effect which a glacier would produce ; and one passage of Von Buch's paper is so strong, that we might fancy he had a moraine in his eye when he wrote it :—

“ They (the erratics) proceed from snow-covered mountains directly in straight lines through the valleys, and thence over the plains, and spread themselves radially, in a heap, (or tuft—*büschelförmig*), at the outgoing of the valleys.”—Page 184.

vi. The larger masses are usually accompanied by small ones—they form, in fact, a group : this is quite conformable to what we have mentioned as occurring on glaciers. An *éboulement* marks its occurrence by the group of fragments which it leaves on the ice.

vii. The fact that the accumulation of blocks at the extremity of modern glaciers is comparatively small, indicating that the actual limit of the ice has not long remained fixed. When we notice the ceaseless energy of glaciers and their enormous transporting power, and compare these with the length of geological periods which we cannot, on other grounds, avoid admitting to have elapsed since the earth assumed its present configuration, we are struck with the trifling accumulation of moraines which most glaciers present. This fact did not escape De Saussure, who found in it a proof that the existing system had not been of long duration :—

“ The blocks of stone (he says) with which the lower part of this glacier (Du Bois, at Chamouni) is charged, give rise to an important reflection. When we consider their number, and when we recollect that they are deposited and accumulated at this extremity of the glacier in proportion as the ice melts, we are astonished not to find the mass more considerable. This observation leads us to think, with M. Deluc, that the actual condition of our globe is not so ancient as some philosophers have imagined.”—(*Voyages*, ii. p. 18, § 625.)

The real answer seems to be, that during the present age of the world

the glaciers have been continually receding, leaving their moraines behind them in the form of erratics.

II. Let us now turn to another and most important evidence of glacier action, of which we have yet scarcely spoken. We mean the figure, and polish, and states of surface, which glaciers are capable of giving to mechanically fixed rocks over which they move. The forms are, (1.) Rounded spheroidal or cylindrical surfaces, exhibited on a great scale, evidently due to the wear of the projecting angular parts. (2.) Undulating grooves, more or less longitudinal and parallel, not unfrequently like the figures produced by a carpenter's cornice-plane, and often highly polished; and, (3.) Fine *striae*, not always parallel, which cut up the polished surfaces even when formed of pure quartz, and which are evidently mechanically produced. We know that water can remove considerable blocks of stone—the origination of moraines by torrents is at least a conceivable speculation—but we totally deny the power of running water to produce all those appearances. Can ice do so? This, we conceive, is the *experimentum crucis* amongst the rival theories, and we believe it to be favorable to the hypothesis of glaciers.

The evidence, we must add, can hardly be appreciated without a personal and elaborate study of the phenomena on the spot. The best approximation to it may be made from the examination of Agassiz' admirable plates, which, for the first time, represent in detail these extraordinary phenomena, destined certainly to play a conspicuous part in the scientific history of the next few years.

The first form of smoothed rounded rocks is beautifully exemplified in the 8th and 16th plates of Agassiz' work—the one at Monte Rosa, the other at the Handeck. The forms in question, for which we have no descriptive name, and which few who have not examined the localities would believe to be faithfully represented in these views, evidently bear no reference whatever to the general structure of the rock, which in the one case is serpentine, in the other an imperfect granite. It must be owned that Saussure's reflections upon these singular polished spheroidal and conoidal surfaces are very unsatisfactory: he admits that the granite rocks are "cut into portions of inclined cylinders, sometimes even of spherical forms, *no doubt* by the erosion of air, water, and avalanches."—*Voyages* iii. page 461. When we find that the gneiss has no concretionary structure here, such as is sometimes observed, and that these surfaces, far from being surfaces of natural desquamation, are frequently cut at right angles to the slaty cleavage, we are bound to look for some other explanation. In the parts of the valley of the Aar where this appearance occurs, the grinding off and smoothing of angular fragments is so universal, that the trough of the valley, to a depth of 1500 or 2000 feet is marked by this distinctive character; whilst the rocky summits of the very same material, which shoot up beyond that elevation, have the rugged and angular forms which gneiss rocks present under circumstances of ordinary decomposition. This peculiarity may be distinctly traced up to the part of the valley still occupied by glaciers, (the upper and lower glacier of the Aar,) the sides of the val-

ley being rounded and smoothed (*moutonnés*;—*emoussés*) up to a height of 800 feet above the sea. This interesting observation—of the truth of which we are persuaded—is due to M. Agassiz, (*Etudes*, page 254,) and tends to show the enormous accumulation of ice then existing in the higher Alps, in accordance with their great extension in length into lower Switzerland, which has been maintained on distinct grounds.

The next configuration of rock, that of grooved surfaces, (*surfaces sillonnées*.) is usually combined with the general external form already mentioned. An admirable exhibition of it is to be found in Agassiz' seventeenth plate, representing a portion of calcareous rock in the Jura, which has since been quarried away, (at Landeron, near Bienne.) These furrows are like nothing else in nature with which we are acquainted. They follow the undulations of the *surfaces moutonnées*, and, as we have already said, resemble the indentations of a carpenter's ogee plane, carried along with a steady pressure for distances of several feet, yards, or fathoms. The reasoning into which we should be led might appear too technical were we to explain why water, whether by itself or carrying *debris* along with it, can never produce similar effects. Being once seen and fully apprehended, we believe that water action would never come into the mind of an unprejudiced person; their continuity, depth, and the circumstance of their rarely or almost never coinciding with the lines of greatest declivity of a surface, speak in language not to be mistaken. Such grooves may be seen and studied at the *Höllenplatte* near the Handeck, the rocks of the valley of Fee, near Saas, the precipitous face of rock above the Pissevache near Martigny, and the rocks of Le Mail near Neufchâtel.\* These phenomena are altogether of a peculiar species, incapable of confusion with any other. The only phenomena at all similar, are certain internal convolutions of the trap rocks (with a felspar basis) of which the origin is undoubtedly mysterious. That the configuration in the Swiss rocks is wholly external and mechanical is plain, both from such surfaces *never* being found covered by a superior layer of rock, and from its occurrence on the exposed side of promontories which have abutted into valleys, down which the glacier is supposed to have descended. A similar fact is described as characterizing the grooves (which every one admits to be also due to mechanical action) on the surface of the Scandinavian rocks described by Sefström and Böttlingk; but whether

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\* Very trifling circumstances often occasion a disparity in the conclusions of different observers. We will mention an apparently inconsiderable influence of this kind: When the sun shines *directly* on a face of rock it appears nearly even, if we are not in a position to pass the hand across its surface. One person may thus see a surface delicately furrowed when the sun strikes it with the proper degree of obliquity, whilst another at a less favorable moment may impute his description to mere fancy and preconception. The grooved cliff above the Pissevache is in this case. From twelve to one o'clock is the time to see it to most advantage. The remarkable grooved surface of the trap rock in contact with sandstone, on the southern declivity of the Castle rock of Edinburgh, is best seen about eleven o'clock, on the same account.

they possess *all* the peculiar characters of the Swiss rocks we are unable to say. The fact can only be pronounced upon by one who has studied both *in situ*.

The third class of superficial mechanical effects, also beautifully and accurately figured in Agassiz' Atlas, (plate 18,) consists of an infinite number of fine lines or *striae* accompanying a general and often exquisite polish of the surface, observed on many rocks which, besides, exhibit the rounded outlines and the characteristic furrows which we have already described. The polish of the surface depends materially on the nature of the rock—where that is quartzose, as in the granites of the Grimsel, the polish is perfectly specular, or similar to that which a lapidary gives to rock crystal;—a condition which it is difficult to conceive that water could give under any circumstances, and which is indeed rare in nature. In the limestone rocks of Jura, this polish equals that of the finest slates used for drawing. In either case the surface is more or less cut up by *scratches*, sometimes as fine as if drawn with a diamond point, and requiring microscopic examination, at other times rough and jagged in their edges. These *striae* have a general tendency to parallelism, but not unfrequently there are two sets inclined to one another, at a considerable angle. The slightest examination seems to show that these *striae* were produced by hard fixed particles, which acted as graters in indenting the surface. These phenomena are perfectly seen on the granites of the Grimsel, and the limestone of Le Chaumont in the Jura.

Such being the phenomena visible in many valleys of the Alps—extending from 8000 feet above the sea (as on the Siedelhorn, near the Grimsel) to the plains of Switzerland, (as on the banks of the Rhone near St. Maurice,) and even to the Jura range—the important question arises, are the glaciers capable of imitating these effects? This is the most difficult part of the evidence of the Glacier Theory satisfactorily to establish. We are bound to say, that after a long scepticism and a patient examination of facts, we consider this important link of evidence to be fairly made out. It is chiefly to M. Agassiz that this result of patient investigation is due, and he has taken great and praiseworthy pains to satisfy all who were willing to be convinced of the fact. The testimony of M. Studer, the most eminent living Swiss geologist, and long a sceptic like ourselves, is the best that we can possibly quote. Speaking of the glacier of Zermatt, near Monte Rosa, he says—“Having mounted about fifty feet on the right or eastern side of the glacier, we were able to approach close to its contact with the fixed rock, and to observe the condition of the latter under the glacier itself. In spite of the mineralogical difference of the rock, which is here a compact green slate, I must state that I was struck with the perfect resemblance of the state of its surface, and that of the calcareous rocks of the lake of Bienne: there are the same smooth forms, the same grooves with rounded edges, the same fine *striae*; the whole being occasioned, beyond any doubt, by the friction against the fixed rock of blocks and sand



carried along under a strong pressure by some agent, and this agent appears in this case to have been THE GLACIER ITSELF."\*

The difficulty of proof of the direct abrasion of glaciers, arises from the difficulty of procuring a complete contact of a glacier and the bed of rock on which it reposes. The immediate junction is often covered by a moraine; and it is evident that, supposing a glacier to maintain always precisely the same position, it could only be by an extensive and dangerous excavation that we could examine the state of a surface of rock over which it has recently passed. But all glaciers are subject to oscillations of various kinds, and their vast *crevasses* unfold occasionally the surface of the trough in which they move. This is the case in the glaciers of Rosenlauri, Viesch, and Zermatt; and those glaciers which are retreating, of which we have many examples in the Alps, display the whole surface which they lately covered. There can be no doubt from observation, that a glacier carries along with its inferior surface a mass of pulverized gravel and lime, which, pressed by an enormous superincumbent weight of ice, *must* grind and smooth the surface of its rocky bed. This fact, which seems natural enough when stated, does not appear to have been distinctly recognized by any writer before Charpentier. We do not remember to have seen it cited that the peculiar character of glacier water is itself a testimony to this fact. Its turbid appearance, constantly the same from year to year, and from age to age, is due to the impalpably fine *flour* of rocks ground in this ponderous mill betwixt rock and ice. It is so fine as to be scarcely depositable. No one who drives from Avignon to Vaucluse can fail to be struck with the contrast of the stream, artificially conveyed on one and on the other side of the road, in order to irrigate the parched plain of Provence. The one is the incomparable limpid water of Petrarch's fountain; the other an offset from the river Durance, which has carried into the heart of this sunburnt region the unequivocal mark of its birth amidst the perpetual snows of Monte Viso. This is the pulverizing action of ice.

Most erroneously have those argued who object to this theory that ice cannot scratch quartz—ice is only the *setting* of the harder fragments, which first round, then furrow, afterwards polish, and finally scratch the surface over which it moves. It is not the wheel of a lapidary which slits a pebble, but the emery with which it is primed. The gravel, sand, and impalpable mud are the emery of the glacier.

We venture to differ from the eminent mineralogist (Necker) who has declared that a mineral can never scratch another of the same degree of hardness.† We have no doubt whatever that quartz can scratch quartz, as much as it is true to a proverb that diamond cuts diamond. The minuter the fragments of a body which fractures an-

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\* Bulletin de la Société Géologique de France.—Tom. xi. page 50.—Séance, 2d December, 1839. The italics and capitals are our own.

† *Etudes Géologiques.* p. 191.

gularly, the more advantage have its particles to penetrate the surface of another similar to itself; nor can we think it doubtful that, *with time and pressure* sufficient, a harder body may be worn, therefore scratched, (since wear is but an integration of infinitely small scratches,) by a softer. In all this, then, we find no objection, but the contrary, to the theory of Charpentier and Agassiz; and, as we have said, facts demonstrate its truth. Agassiz' seventh plate shows the favorable circumstances under which it may be studied in the serpentine rocks beneath the glacier of Zermatt, (alluded to in the preceding extract from Studer;) and although the neighboring rocks, at some distance from the glacier, and much above it, indicate the same structure, yet it is so plain that the freshness and perfection of the surface increases with its proximity to the glacier, that we can hardly suppose that the presence of the glacier is accidental where the polish appears; but rather we are bound to conclude that the appearance of the polish indicates the former presence of the glacier.

It is to the evidence of the long, continuous, nearly horizontal furrows, such as those of Landeron, that we ascribe the most certain and conclusive evidence of glacier action. We do not doubt that hard pebbles included in the ice coursing along successively in a channel once formed in a comparatively soft rock, like limestone or serpentine, is a cause capable (considering the intense incumbent pressure) of producing the effect in question. *We know of no others such.* They may exist, but they have not yet been pointed out. The importance of this admission is very great. There is little reason to doubt that we shall soon have irresistible evidence presented to us of similar effects existing on many parts of the earth's surface. A very eminent geologist, who still refuses assent to the glacier theory, has assured us that the specimens of *striae* in his possession, from the valley of the Aar, the Jura, Fahlun in Sweden, and Boston in America, are so identical in character as to leave no doubt in his mind that they were engraven by one and the same agent. When to this we add the identity established above, between the *striae* of the Alps and Jura, and those *under* existing glaciers and in the process of formation, the importance of the admission will be fully appreciated; and it is not too much to affirm that the authority of the individual who makes it, would go far to settle the question with that preponderating class of the geological world who take their impressions from the authority of others. We would not, however, too rashly proclaim the explanation universal; for geology is one of those imperfect sciences where it is impossible to carry out principles *a priori* into all their seemingly legitimate consequences; and amongst those wider speculations is the supposed extension of glaciers to all extra-tropical regions of the globe—first proposed by Charpentier, and since more especially insisted upon by Agassiz. It is well known that in northern Italy, in the Pyrenees, the Vosges, the Carpathians, the mountains of Sweden, Finland, and Scotland, and the plains of Russia, Prussia, Denmark, and England, similar phenomena of distributed blocks, and in many cases of grooved and polished surfaces, occur.

Upon this wide field we cannot at present enter; but on the principle of employing the evidence of the opponents of the glacier theory, we will quote one most remarkable admission of M. Necker, with respect to the distribution of boulders derived from the Alps:—

"Wherever," he says, "the central chain of the Alps surpasses much the limits of a perpetual snow, and consequently, wherever it presents glaciers, we observe, at the openings of great valleys, masses of blocks and other diluvial debris. Wherever, on the contrary, the central chain does not attain this limit, or but little exceeds it, we find diluvial blocks neither in the openings of the valleys, nor in the neighboring plains.

It is also a remarkable fact that the only chain in Europe, besides the Alps, which penetrates considerably into the zone of perpetual snow, and which has great glaciers, namely, the Scandinavian chain, is also the only one from which have descended vast masses of rock and diluvial debris."—(*Etudes Géologiques*, p. 359.)

We had intended stating the objections which have been, and may be urged against the glacier theory—which are no doubt both numerous and real—but what geological theory ever was or can be free from objections? And in this respect, without professing our unlimited conversion to it, we boldly assert that the glacier theory, in its application to the Alps, has so abundant *prima facie* evidence in its favor, as to be entitled to be placed under the category of *geological probabilities*. As to the *certainties* of geology, on which a work has lately been published, we apprehend that an unbiassed critic would purge the list to a diminutive bulk. We must, however, for the present conclude; and will therefore only trespass for a moment longer on the reader's patience, by alluding to one of the objections which has been very generally felt and urged: it is the difficulty alluded to at the commencement of this article—the inconsistency of the hypothesis of an Arctic climate, with the geological evidence of fossils commonly supposed to indicate that the temperature of the earth's surface was, in all former times, *higher* than at present.

This difficulty is urgently pressed by M. Studer; but if the facts seem to prove the existence of ice over any large portion of the earth's surface, it would be vain to oppose all the little analogical information which we derive from historical data, and from physico-mathematical researches on the subject. Such *inferences* must bend before *facts*. The evidence of fossils, indeed, is of a more conclusive kind; but we must first see that that evidence is quite *positive*. The theories of a local and temporary nature proposed to account for the cold of Switzerland in particular, or Europe generally, are, we think, too vague and gratuitous to be worthy of much attention.

It is certainly remarkable that the opponents of the so-called glacier theory, are themselves obliged to admit *some* extension of the glaciers; and to explain this they admit a reduction of temperature. M. Elie de Beaumont and M. Necker have directly, and Mr. Lyell indirectly, admitted this. The first attributes the diluvial currents, which he sup-

poses to have conveyed the Alpine blocks, to the *fusion of ancient glaciers*; the second applies similar reasoning to the lakes with *glacier barriers* which furnished his *debacle*; and the last (together with Mr. Darwin and many others) must have his half-frozen lake with floating icebergs down to the level of the Jura range. Charpentier and Agassiz ask only a little more of what their opponents cannot altogether refuse—*cold*.

But more than this. Mr. Smith has shown\* that the post-tertiary deposits of the west of Scotland, *coeval with the boulder formation and the till*, indicate, by their included shells, evidences of an approach to an ARCTIC climate at that period, being identical with the *existing* species of Newfoundland and even of Spitzbergen; and Mr. Lyell has deduced from Canadian fossils the conclusion that, "at the period immediately antecedent to the present, the climate of Canada was even more excessive than it is now," and that "*this extreme cold may have coincided with the era of the principal transportation of erratic blocks.*"† This is surely a beautiful and interesting coincidence, and one which, if fully established, as we believe it is likely to be by the further researches of M. Agassiz, must go far to remove the chief outstanding difficulty to the glacier theory; for we cannot altogether understand the objection which Mr. Lyell seems to make to its application to Switzerland, from the *absence* of the post-pliocene fossils in that country.‡

The same ingenious author has objected to the glacier theory, § the small inclination which the glacier could have; which he estimates at 2°, and which Charpentier has reckoned still lower.|| The objection is a natural one; but it may be replied that we have as yet no data for assigning the *lowest* inclination of a glacier consistent with motion; and it is even probable that, as the glacier increases in size, this inclination may be less. We have already observed that the slope of some considerable glaciers is in many places less than 3°. Objections which seem to us to be more difficult to reply to, arise from the obscurity of the manner in which the blocks derived from the *terminal* (?) moraines of the Alpine glaciers were deposited on the opposing flank of the Jura. If the plain of Switzerland were a vast glacier, of which those of the Arve, the Rhone, and the Aar were but tributaries—and if this glacier had a north-easterly motion, as the grooves near Neufchatel and Bienne would seem to indicate—it is not easy to see how the Rhone blocks should have been deposited opposite to the embouchure of that valley, instead of forming a lateral moraine at the base of the Alps. The distribution of the remoter *erratics* in the very heart of the Jura range,

\* *Proceedings of the Geological Society of London*, 24th April, 1839, and 6th November, 1839.

† *Proceedings of the Geological Society of London*, 24th April, 1839.

‡ *Elements of Geology*, i. 253, (1841.)

§ *Ib'id* p. 250.

|| Namely, 1° 8' 50". *Essai*, pp. 174 and 237.



and the position of many of the scratches on the fixed rocks, present difficulties which we believe to be still unexplained.

It is, however, impossible to expect that all such difficulties should at once, or even at any time, entirely vanish. It is in the explanation of these that Charpentier and Agassiz, the able champions of the glacier theory founded by Venetz, are not agreed. We trust that their discussions will ever be conducted in the spirit of honorable rivalry in carrying out the arguments, of which so many are original to each. We have attempted, in seizing only the main details of this interesting epoch of scientific discussion, to assign to each author his due, without partiality or reserve. Such a course must eventually be best for the interests of all concerned. If we have passed over some subordinate writers, it is neither from ignorance nor negligence; but from want of space, and from a desire to concentrate the attention of our readers on the analysis we wished to present of the leading features of the controversy.\* We have not chosen to conceal the personal interest we feel in one of the most curious and many-sided physical questions which has been brought under discussion for many years. We willingly acknowledge our debts to the calm sagacity of Charpentier, and to the noble ardor of Agassiz. We owe, perhaps, still more to the generous friendship, the unvarying good temper, and the true hospitality of the latter. It is through the intermedium of Professor Agassiz and his work that this subject has been introduced to the British public; and we know that to them he looks anxiously for the affirmations of his opinions. The glacier theory has not, as we have already hinted, received as yet the usual passport to general acceptance. Excepting Dr. Buckland, no geologist of note in this country has fully adopted even the opinions of Charpentier respecting Alpine glaciers; much less those of Agassiz, which point to a great envelope of ice into the extra-tropical regions of the globe. Mr. Lyell has indeed said enough to testify his willingness to admit views, which, if proved, would so well accord with his fundamental theory; but he has not given in his adhesion to the details. Even in Switzerland the conversions to the glacier theory (though it may be considered a national one) are slow and partial. In France it has made very little way: MM. Elie de Beaumont and Arago, with the classes of geologists and natural philosophers whom they represent, still stand aloof. In Germany there is no hypothesis which will not find numerous supporters; but who shall lead, whilst Von Buch and Von Humboldt withhold their assent? To maintain the glacier theory still requires some confidence—some courage. We have not dissembled its difficulties; but by presenting it, as we have endeavored to view it, with unprejudiced eyes, as fully entitled to rank among *geological probabilities*, we place it on its most defensible ground, and

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\* The work of the Rev. Canon Rendu of Chamberry, on the Glaciers of Savoy, deserves to be specified as a rare instance of a really scientific work issuing from the press of Savoy. We regret to have seen it but cursorily, having in vain endeavored to procure a copy even in Switzerland.

we venture to predict, at least abroad, a speedy re-action in its favor. Its evidences are such as must be *seen*, and carefully studied without prejudice, in order to be appreciated; and such evidences, though often required to be sought for, and difficultly found, are not less conclusive when attained. We have constructed a formidable panoply out of the missiles of its adversaries; will they not yield to their own weapons? If they pronounce the theory imperfect, we acknowledge it; but we may very safely challenge them to produce a better or less improbable one, from amongst those already proposed. If they have a new one, we are ready to consider it.

## ARTICLE II.

### HEGEL'S ÆSTHETICS:—THE PHILOSOPHY OF ART, PARTICULARLY IN ITS APPLICATION TO POETRY.

From the British and Foreign Review, Feb. 1842.

1. HEGEL'S *Vorlesungen über die Ästhetik*. Herausgegeben von Dr. H. G. Hotho. 3 Bände. (Hegel's Lectures on Æsthetics. Edited by Dr. Hotho. 3 vols. Berlin, 1835.)
2. SOLGER'S *Vorlesungen über die Ästhetik*. Herausgegeben von K. W. L. Heyse. (Solger's Lectures on Æsthetics. Edited by Heyse. Leipsig, 1829.)
3. JEAN PAUL. *Vorschule der Ästhetik*. (Jean Paul's Introduction to Æsthetics. 3 vols. Leipsig, 1826.)
4. QUATREMERE DE QUINCEY. *Essai sur l'Idéal dans ses applications pratiques aux arts du Dessin*. Paris, 1837.
5. DE QUINCEY. *Essay on the Nature, the End, and the Means of Imitation in the Fine Arts*. Translated by J. C. Kent. London, 1827.

It is a mistake to assert, as is so often heedlessly done, that the English have no system of Æsthetics—no genuine philosophy of art—a serious mistake, implying reflections on our “commercial character” which amount to insult. We have a system; a definite, tangible, perfectly practical one; and it lies written in the weighty volumes of Smith's “Wealth of Nations,” Macculloch's “Commercial Dictionary,” and De Morgan “On the Differential Calculus.” Art may not with us be a “revelation of the Infinite,” but it is a very positive branch of *trade*, and subject to all the fluctuations of market and fashion, in common with every other produce of refined civilization. Our age is a practical—our country a commercial one. A book is not usually published to give utterance to some mighty and carefully elaborated truth,

but "in consequence of the demand." Great authors are no longer looked upon as priests of the social life, speaking from the foot of their respective altars the winged words of a divine mission, but as "popular and admired writers," whose names ensure a ready demand from circulating libraries and book-clubs. No poetic mania—no *μανία δεινή* (such as Aristophanes attributes to Æschylus, unable otherwise to account for his golden verses,) is now, except in obscurest corners, supposed necessary for the production of immortal works—but a refined calculation and comprehensive survey of the "state of the market," the *callida junctura* (skillful arrangement) which Horace recommends has taken the place of the real art—*calida junctura*, or impassioned conjunction. How far this commercial theory may be true we know not; at the same time we are happy in the knowledge that such is not the universal belief, that other nations regard Art as something far transcending any commerce yet invented, and that many even here in Britain share the same opinion; to these then we address ourselves in the hope of calling their attention to the æsthetical systems of German philosophers, and so let an examination and comparison of them with their own take place, which may not be fruitless in disseminating truer notions amongst our artists.

To those who regard Art as something higher than works "done to order," and as requiring for its production higher endowments than persevering industry and cunning imitation of rules and examples, and to those artists who study the works of their predecessors, not to steal materials with which to build up their own mosaic rickety productions, but to catch some reflection of the light which shone in them, and with it learn to read the deeper mysteries and meanings of nature, to sit under the sun of genius, and watch with reverent eyes the direction of its beams, piercing with them into unexplored, undreamt of regions, and then returning to utter the glad tidings to the world—in a word, to the *Artist* as opposed to the *Artisan*, the present state of criticism in England must needs be an unsatisfactory object of contemplation. The poet whose life has been distilled into his work, who in obeying the ever-moving impulse from within, has laboriously chosen, arranged and fused his materials, so that a coherent whole arises from the smouldering ashes of his sufferings, finds in criticism no sympathizing, reverent and affectionate sister, who will assiduously fetch out the latent meaning, and irradiate, with her understanding, those more dim and intense feelings of his imagination which may have found expression in unusual forms. Of what avail are years of toil? why waste time upon your art when it will not be recognised, and when a few "quotable passages" and showy descriptions will be sure to "tell" better? This is what the artist may be tempted in his despair to ask himself. There are some critics indeed who put forth deep and comprehensive views, evincing a perfect appreciation and knowledge of the aim and means of art, but they might easily be numbered; for indeed what Gæthe calls "*Sinn für ein æsthetisches Ganzes*," is given but to few.

But let us turn our eyes to France or Germany, and see what a dif-

ferent state of things presents itself. We cannot take up the merest three-halfpenny journal without being struck with the different spirit animating it: whatever may be the extent of the critic's vision, he looks out from a higher point of view, and speaks from ascertained principles. Such being the facts of the case, let us show how imperative it is in us to seek an outlet from our own "cabin'd, cribb'd, confined" sphere, into the great world of æsthetics. An unmistakeable tendency towards it is to be read in various quarters. Men are oppressed with a sense of the insufficiency of their own views, and in struggling to overleap the barriers but too often fall exhausted on the ground with no other result. Yet this struggle, however impotent in their own persons, calls attention to the fact, and awakens the clear eye of penetration which may see the outlier. This also has in some measure been done. The immense influx of German literature has brought with it an importation of its æsthetics\*—unfortunately only in fragments and imperfect insights—nowhere as a complete system; and the great diffusion of the works of the two Schlegels, already translated, is an evidence that the subject itself is not uncongenial. But to attain some more complete insight into Art, to produce something higher than acute fragmentary criticism, we must go back to Germany and obtain some idea of it as a science. It is to facilitate this purpose that we propose introducing to our readers the works we have placed at the head of this article.

The definite meaning of the word "æsthetics" it may not be superfluous to explain. The mere word is vague and poor enough; it was invented by Baumgarten many years ago, to express "the doctrine of emotions" (*ab αισθημάτων*), because Art addresses the *feelings* rather than the intellect. But this, as all abstract terms, requires elucidation; and this elucidation can only be completely gained by a study of the *thing*, to which after a few remarks we shall address ourselves.

Æsthetics then is the *philosophy of Art*. It is not criticism, neither is it technical knowledge, but the theory of the inner life and essence of Art. It is not purely *empirical*, like criticism, which is the knowledge of peculiar facts or laws, derived from observation of works; but the theory of Art generally—the development of the fundamental Idea through its particular forms and manifestations, thus deducing all secondary laws, all critical canons, from the one primary law. Such is æsthetics as a science—the *a priori* theory of Art—the absolute statement of the conditions, means and end of Art, rigorously deduced from philosophical principles. Criticism of course, if it would be philosophical, must grow out of an æsthetical foundation, as the practical and applied form of its philosophy, and so in common conversation or writing, æsthetics and criticism are often confounded. Nor is there much harm in this, if the empirical and philosophical natures of the two be always distinguished.

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\* To say nothing of the Quarterly and Monthly Journals, the essays in which, from time to time, betray their German origin—the *Times* has quoted Hegel. The *Spectator* has had articles on *Æsthetical Economy*; and in the *Atlas* for the 20th of March, the question is asked, "Why is there no Professor of Æsthetics at Oxford?"



When an incident, character, or sentiment, is said to be not æsthetical, it is meant that such is a *violation of the feeling which it is the end of Art to produce*. Prosaic passages are therefore nonæsthetical, as also are contradictions of known laws of pleasurable emotion. Criticism is to æsthetics what the practice of medicine is to physiology—the application to particular cases of the fundamental knowledge of the constitution and organization of man, aided by a mass of particular observations. *Æsthetics is the physiology of Art*, and as all Art has a philosophical foundation, so it necessarily demands a philosophical elucidation. The necessity for a philosophical *fundus*, not only to criticism, but to all forms of speculation, cannot, one would think, for an instant be doubted, and certainly not by those imbued with German literature, where the existence of such a stratum lying underneath the whole of practical thought, is the one thing prominent and distinctive.

But the deplorable condition in which criticism is tossing restlessly about on the great ocean of uncertainty, on all points deeper than mere technic, may be best ascertained by a consideration of the want of definiteness, the want of unanimity on the first question of all—on the question which must be clearly comprehended and solved before one single step can be taken, containing as it does the *germ* of all Art—we mean the oft-mooted question—*What is Poetry?* Have there not been innumerable essays, disquisitions, discussions, definitions and prefaces on this subject, and are we nearer the mark? Alas, no! The only cheering sign in the whole matter is the restlessness, which, not satisfied with these vague generalities, ever prompts men to fresh attempts. This is an old question, and one which, from its very simplicity and our familiarity with its subject, is not easily analyzed. Hence the vagueness and inapplicability of all definitions. Men do not look steadily and patiently at the thing, but follow its shifting lights, dancing now here, now there, and give us but a sense of their own uneasiness for result. Thus when Schlegel calls it “the mirror of ideas eternally true,” he is not only wrong (as we shall see), but extremely vague. What application can be made of such a definition? Schiller does not advance the matter by calling it “the representation of the supersensuous.” Aristotle’s celebrated dictum, of poetry being an “imitative art,” does not distinguish it from the other arts, and is moreover false. To say poetry is an imitative art is saying nothing if true, but it is not true. An image is defined by Quatremère de Quincy to be “morally speaking the same as its model, though physically it is some other,” and imitation is “to produce the resemblance of a thing, but in some other thing which becomes the image of it.”\* This is the best possible explanation for Aristotle, and yet it does not render his definition correct. Poetry is *substitutive* and suggestive, not imitative; words, not images, are employed; nor let it be supposed, as it too generally is, that words raise the images in our minds—they seldom, if ever, raise an *image* of

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\* On Imitation in the Fine Arts.

the *thing*, often no images at all, as some of the finest passages will evidence.\* Compare Æschylus, Milton, or Shakspeare on this point. "It is one thing to make an idea clear, and another to make it *affecting* to the imagination."† What *images* does Milton's description of Death call up?

"The other shape,  
If shape it might be call'd that shape had none  
Distinguishable in member, joint or limb;  
Or substance might be call'd that shadow seem'd,  
For each seem'd either; black he stood as night;  
Fierce as ten furies—terrible as hell."

If poetry is an imitative art—imitative of what? of external reality? images of what? of things seen or felt? Of what is the above passage imitative? "Whoever attentively considers the best passages of poetry will find that it does not in general produce its end by raising the images of things, but by *exciting a passion similar to that which real objects will excite by other means*."‡ This is profoundly true, and goes to the root of the matter. Even in description, when imitation would naturally be more close, the poet does *not* present images of the thing described. "Descriptive poetry consists, no doubt, in description, but in description of things as they *appear*, not as they *are*; and it paints them, not in their bare natural lineaments, but arrayed in the colors and seen through the medium of the imagination set in action by the feelings. If a poet is to describe a lion, he will not set about it as a naturalist would, intent on stating the truth, but by suggesting the most striking likenesses and contrasts *which might occur to a mind contemplating the lion* in the state of awe, wonder, or terror, which the spectacle naturally excites."§ The error we are uprooting is deeply seated and far-spread; its traces are constantly visible in criticism; and it was so firmly believed in by Dr. Darwin, that he made it the groundwork of his poetry. A single instance of his misapprehension occurs in the "Botanic Garden," where he thus criticises Pope: "Mr. Pope has written a bad verse in the Windsor Forest,

'And Kennet swift, for silver eels *renown'd*.'

The word '*renown'd*' does not present the idea of a visible object to the mind, and thence is prosaic. But change the line thus,

'And Kennet swift, where silver graylings play,'

\* Hegel's theory of language quite settles this point. We will only select one position. The *name*, according to him, has the same value as the representation, and it supplies its place in memory. Pronounce the name of a lion, and there is no need of the image of a lion, the *name* being the intellectual existence of the *thing*.

† Burke, "On the Sublime and Beautiful." A book undeservedly neglected. If some of his theories be false, there are, nevertheless, admirable remarks scattered through it.

‡ Vide Burke, "On the Sublime," Part II. Sec. 3, 4, 5; and Part V. Sec. 5, 6, 7.

§ Monthly Repository, vol. vii. p. 63.

it becomes poetry, *because the scenery is then brought before the eye.*" If this were once admitted it would sweep away the finest poetry, and substitute *an animated catalogue of things.* This error is, as indeed is all error, an incomplete truth. It is true in part, and only false when applied to the *whole.* An image that is addressed to the *eye* should of course be clear and defined, or it is useless. Images in poetry are used to intensify, or render intelligible that which would otherwise not be so clear, and therefore a *visual* object may be brought to illustrate one that is not visual—but when thus selected it should be correct. So far Darwin's theory is admissible; but he makes the grand mistake of supposing that *all* images in poetry must be addressed to the eye; forgetting that the other senses, physical and moral, (so to speak,) are also addressed. Poetry then is not an imitative art, in any sense which may be legitimately given to imitation; nor can we think, with the Marquis de Santillana, that it is an invention of "useful things," which, being enveloped in a beautiful veil, are arranged, exposed and concealed according to a certain calculation, measurement and weight. "*E que es la poesia, que en nuestra vulgar llamamos gaya sciencia, sino un fingimento de cosas utiles, é veladas con una hermosa cobertura, compuestas, distinguidas, escondidas por cierto cuento, peso é medida?*" Our English critics talk elaborately about its being derived from *poiesis*, and meaning *creation*—whereupon many rhetorical flourishes, and the thing is done!

Done certainly, and to the complete satisfaction of the doer, but unhappily to the complete satisfaction of no other mortal, since the only possible value of a definition is, not the mere utterance of rhetoric, but the being able to use a searching, definite expression as a safety-lamp to guide us through the perplexed labyrinth of philosophy; and that no man *can* grasp any lamp hitherto proffered, arises from the fact of its being, like Macbeth's dagger, a mere phantom, "proceeding from the heat-oppressed brain" of the definer—a delusive Will-o'-the-wisp, leading the confiding traveller through the muddiest bogs of error. The old scientific writers used to comfort their ignorance by saying that "nature abhors a vacuum," and so most men think poetry abhors a definition. We, on the contrary, think she abhors nothing, but eminently invites inspection; and "let us therefore," to use the words of a philosophical critic, "attempt, in the way of modest inquiry, not to coerce and confine nature within the bounds of an arbitrary definition, but rather to find the boundaries which she herself has set, and erect a barrier around them; not calling mankind to account for having misapplied the word poetry, but attempting to clear up to them the conception which they already attach to it, and to bring before their minds as a distinct *principle* that which as a vague *feeling* has really guided them in their actual employment of the term.\*"

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\* Monthly Repository, vol. vii. p. 60.

We think Poetry demands two separate definitions, each the complement to the other.

1. Its *abstract* nature, *i. e.* Art as Art—the “spirit which informs” architecture, sculpture, painting, music and poetry, considered in its abstract existence.

2. Its *concrete* nature, *i. e.* poetry as an individual art, and as such distinguished from the others, and from all forms of thought whatever. These definitions we offer as

1. *Poetry is the beautiful phases of a religious idea.*

2. *Poetry is the metrical utterance of emotion.* [This either expressive of emotion in itself, or calculated to raise emotion in the minds of others.] These two definitions, united into one general definition, may therefore stand thus:—the metrical utterance of emotion, having beauty for its result, and pervaded by a religious Idea which it thereby symbolizes.

The wording of these definitions may be questionable, and they require elucidation: the first may be called the *religious Idea incarnate in the beautiful*: but any formula must needs be elucidated: and this we proceed to attempt—till after which we beg the reader to suspend his judgment. The second we must consider first. Poetry must be emotive, it must be metrical—these are its conditions.

The domain of Art is not the intellect, but the emotions—not thought, but feeling; it occupies itself with thoughts only as they are associated with feelings; as Bettina profoundly says, “art is the intuition of spirit into the senses. *What you feel becomes thought, and what you strive to invent becomes sensual feeling\**,” and thus, as Coleridge and Wordsworth have long taught, the true antithesis to poetry is not prose, but *science*. “Poetry is the breath and finer spirit of all knowledge; the impassioned expression which is in the countenance of science.” Thoughts do and must abound in all good poetry, but they are there not for their *own sake*, but for the *sake of a feeling*; a thought is sometimes the *root*, of which the feeling is the *flower*, and sometimes the *flower*, of which feeling is the *root*. Thought for thought’s sake is science—thought for feeling’s sake, and feeling for feeling’s sake are poetry.

And therefore must poetry be emotive. Take as an illustration Shakspeare’s description of morning—

“Lo! where the morn, in russet mantle clad,  
Walks o’er the dew of yon high eastern hill.”

Every one recognises this as poetry; yet change the *emotive expression* of it into a *statement* and it ceases to be poetry, or even change it into figurative prose, and by thus altering its emotive expression, which the “lo!” so well commences, the poetry is gone. Thus, “The morning

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\* Goethe’s Correspondence with a Child, vol. ii.



now arises clothed in his mantle of russet, and walks over the dew on the high hill lying yonder in the east"—this is ornate prose. But perhaps the intense figurativeness of the language obscures our meaning; so take a line from "Childe Harold"—

"The moon is up—but yet it is not night!"

These are two *statements*, which if put as *facts* in conversation are as prosaic as the statement of the weather, or the time of day; yet here the speaker himself is in a state of emotion—he utters it in awe, in mystery, in meditation—he does not announce it as a fact, and his emotion communicates itself to us. So Shakspeare's most religious saying, that there is a soul of goodness in things evil, is *in itself* no more than a philosophical opinion addressed to the understanding; but as such it would be thought for thought's sake (*i. e.* science): here the *emotive expression* of it shows it to be for the sake of the feeling—

"God Almighty!  
There is some soul of goodness in things evil,  
Would men observingly distil it out."

Pity that the solemn and fitting adjuration, "God Almighty," should always be omitted when the passage is quoted!

But although *not always expressing* emotion, poetry must *always by some art excite it*, and never let its necessary statements or prosaic passages be prosaic in effect. Wordsworth often offends in this way by descriptions which are nothing more than *catalogues*; as take the following, which is, except a word here and there, ten-feet prose:—

"Tis nothing more  
Than the rude embryo of a little dome  
Or pleasure-house, once destined to be built  
Among the birch trees of this rocky isle.  
But as it chanced, Sir William having learn'd  
That from the shore a full grown man might wade  
And make himself a freeman of the spot  
At any hour he chose, the knight forthwith  
Desisted, and the quarry and the mound  
Are monuments of his unfinished task."

If there were not so many hundred similar prosaic passages in Wordsworth, one would wonder that he could have let this pass; it is certainly antagonistic to the spirit of poetry, and is felt to be so, all critical canons apart. "These are the axioms of poetry," says Solger. "Everything must be action or emotion. Hence a purely *descriptive* poetry is impossible, if it confine itself to its subject without action or emotion; on which point Lessing has some admirable remarks in the "Laocoon." In Homer you never see a particular subject merely *described*, but the description is always contained in some action. So the clothing of Agamemnon, or the shield

of Achilles, where the subjects represented appear themselves as living and in action\* ;” and the reason of this is given by Hegel when he says, “not *things* and their practical existence, but pictures and imaginative symbols are the materials of poetry.”

It is this emotive principle which creates all the ornaments, as they are styled, such as personification, metaphor and trope ; for nothing being announced as a fact, but every thing as seen through the passionate medium of the speaker's soul, it necessitates a figurative impassioned language, and here Professor Wilson's definition of poetry, “man's thoughts tinged by his feelings,” becomes admissible, except that it does not demarcate it from novels or oratory. “Ornaments” may be used by imitators and verse-makers, but they are always foreign, repulsive and cumbersome, simply because they *are* ornaments ostentatiously worn for their glitter, and not *real associations* clinging round the central feeling. But in the true poet, imagination acting on the feeling, or the feeling acting on the imagination, condenses and fuses a whole series of ideas into one *nexus* of expression ; such is personification, one of the most poetical of figures, but which, when not springing from the ground of real passion, becomes an impertinence in the imitator or scholar-poet, and warms the mind no more than prose. When Milton speaks of

“The starry Galileo in his woes,”

it is as if lightning flashed on the whole dark career of the man ; all the scattered rays of light which have played around his name, his discoveries and his misfortunes are converged into one focus, and stand burning inextinguishably there. This is an instance of true passionate expression. Byron, in his celebrated stanzas on the Dying Gladiator, has given as striking an instance of the false expression—the merely *recherché* illustration suggested by thought or perception of analogies purely intellectual :—

“And through his side the last drops ebbing slow  
From the red gash, fall heavy, one by one,  
Like the first of a thunder shower.”

Nothing can be more forced than the comparison of drops of blood to drops of rain. Note also the antithesis of *last* drops of blood and *first* drops of rain. The common epithet “snowy bosom” is another example. Marino in Italy, and Gongora in Spain, as well as Cowley and Donne in England, only pushed this principle into a system, and the result was affectation or wit. It is against such ornaments, and the vicious *Gongorism* they induced, that Wordsworth's theory was virtually directed ; and although he was radically wrong in saying poetry differed in nothing from prose, yet we confess that such ornaments as

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\* Solger, Æsthetik, 3<sup>ter</sup> Theil, 2<sup>ter</sup> Abschnitt.

coquettes put on the bosoms of their verses are but as gauds to hide the wrinkled skin on which they glitter; still those who, in their fury of simplicity—who, in their disgust at dowager-diamonds, declare that a lovely maiden shall not place a rose in her hair, because ornament is unnecessary, commit a sad blunder, and slight the beautiful because the deformed will ape it. Wordsworth, in consequence, often writes passages worthlessly prosaic. Nevertheless, although *prosaic*, such are not *prose*, simply because of their metrical expression; and this leads us to the second point of our inquiry, viz., the essential position of verse.

The dispute as to whether "prose can be poetry," is one of the most astounding instances of the want of clear notions on art which could well be selected—it even beats the discussion as to whether Pope was a poet. The unanimity of critics, that verse is nothing *essential*, is so great as almost to overwhelm our deep-rooted convictions; and did we not fancy that we not only see their error, but also *how it became one*, we should be tempted to give up in despair. Not only do writers perpetually caution their readers against supposing that they "regard verse as synonymous with poetry" (as in truth it is not)—of which opinion they have a religious horror—but the sum of the whole we take to be, in a recent critic's contending that Wycherley and Congreve were poets! The cause of this wide-spread error is partly owing to the want of clear definitions, partly that verse is a thing to be *learned* by all, whereas poetry is confessedly a talent given to few, and partly that many passages of prose are poetical. *Poetical* they may be, but not *poetry*—partaking of the *imaginative spirit*, but not of the *musical body*—a distinction always overlooked. It were as wise to talk of painting without color as poetry without verse. Design is the groundwork—expresses the idea; but design alone is not painting: so thoughts or emotions uttered in prose are not poetry, but the mere *cartoons* of poetry. It is on all hands admitted that poetry is *an art*; if so, then we demand of the critic, what are its conditions? Is prose an art? or is it the *same art*? These questions admit but of one answer. Much verse is employed by ambitious young gentlemen and ladies to express thoughts and feelings, real or imaginary, which criticism must admit to be very bad poetry, and which can get no recognition as art, except from the authors, and the "select friends" who "so earnestly urged their publication; and the classing this trash with the Homers and Dantes, with all that we know of holy, indestructible beauty, may certainly blind the angry critic. Nevertheless public house signs, or the delineations of Scotchmen standing before tobacconists' shops, are specimens of painting and sculpture *in degree*, though not of a degree to be admitted into Academy exhibitions. Turnspits are dogs, though of a beaten and despised race. Synonymous with poetry no one would assert verse to be; but an artistic element, a condition—*Eine sinnliche Hülle*—we insist upon being conceded to it. "Versified prose," says Hegel, "is not poetry, but simply verse; as a poetical expression of an otherwise prosaic handling is only poetical

prose ; nevertheless metre is the first and only condition absolutely demanded by poetry, yea, even more necessary than a figurative, picturesque diction\*."

Verse is the form of poetry ; not the form as a thing *arbitrary*, but as a thing vital and essential ; it is the incarnation of poetry. To call it the *dress*, and to consider it apart as a thing distinct, is folly, except in technical instruction. Rhythm is not a thing invented by man, but a thing *evolved* from him,† and it is not merely the accidental form, but the only possible form of poetry ; for there is a rhythm of feeling correspondent in the human soul. "Melody," said Beethoven, "is the sensual life of poetry. Do not the spiritual contents of a poem become sensual feeling through melody?" Verse is the type of the soul within.

Poetry then, we agree with Wordsworth, is not the antithesis to prose, neither is animal the antithesis to plant ; but a generic difference exists, which it is always fatal to overlook. Verse is not synonymous with poetry, but is the incarnation of it ; and prose may be emotive—poetical, but never poetry. To those who assert, that all that is said in verse might be equally said in prose, we answer, as soon might cabbages be violets ; we may as well object to the restricted size of the violet, forgetting its odor, or to its want of utility, forgetting its beauty. George Sand, in "*Les Sept Cordes de la Lyre*," has a fine answer to some objections on the incompleteness of the form of art for the communication of truth : "*Maitre, vous oubliez que l'art est une forme, et rien autre chose.*" And a greater than George Sand has profoundly said :—

"Müset in dem Munstbetrachten  
Immer Eins wie Alles achten,  
Nichts ist drinnen, Nichts is draussen  
Denn was *innen*, dat ist *aussen*."

We wish this point to be well weighed, because, if we are correct in our conclusions, they lead to important results, and many old debated questions vanish at once. Their principal merit consists in demarcating poetry from every thing else—from novels or from eloquence,—a distinction all have felt, and none clearly explained. Coleridge is every where vague and unsatisfactory, and can find no other distinction between poetry and novels, than that "poetry permits the production

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\* Æsthetik, b. iii. p. 289.

† This has been irrefutably put by a contemporary. "All emotion which has taken possession of the whole being—which flows irresistibly, and therefore equally—instinctively seeks a language that flows equally like itself, and must either find it, or be conscious of an unsatisfied want, which even impedes and prematurely stops the flow of feeling. Hence, ever since man has been man, all deep and sustained feeling has tended to express itself in rhythmical language, and the deeper the feeling, the more characteristic and decided the rhythm, provided always the feeling be sustained as well as deep. For a *fit* of passion has no natural connexion with verse or music ; a *mood* of passion the strongest."—*Westminster Review*, April, 1838, p. 42.



of a highly pleasurable whole, of which each part shall also communicate for itself a distinct and conscious pleasure." The distinction has, however, been so ingeniously put by the philosophical critic before quoted, and the passage contains so much note-worthy matter, that we extract it :—

"Poetry and eloquence are both alike the expression or uttering forth of feeling. But, if we may be excused the seeming affectation of the antithesis, we should say that eloquence is *heard*, poetry is *over-heard*. Eloquence supposes an audience; the peculiarity of poetry appears to us to lie in the poet's utter unconsciousness of a listener. Poetry is feeling confessing itself to itself in moments of solitude, and bodying forth itself in symbols, which are the nearest possible representations of the feeling in the exact shape in which it exists in the poet's mind. Eloquence is feeling pouring itself forth to other minds, courting their sympathy, or endeavoring to influence their belief, or move them to passion or to action."\*

The critic thence deduces the reason why the "French, who are the *least* poetical of all great and refined nations, are among the *most* eloquent; the French also being the most sociable, the vainest and the least self-dependent." But it appears to us that the critic has here fixed his eye solely on the *spirit*, forgetting the form; he has looked at the creative *mind* of the artist, not at the *work of art*; regarding the motive, not the result. We maintain that verse alone, by conditioning the art, is the grand distinction between poetry and every other art.

We have now disposed of the second, or *technical* part of our definition, and are now in a condition to examine the first part—the *beautiful phasis of a religious Idea*.

The word "beautiful" itself might challenge a definition, were it not sufficiently intelligible from the context; but "*pleasurable*" might also be substituted. That the medium of Art must necessarily be the Beautiful, no one doubts; but unfortunately this dictum is not sufficiently applied in criticism, or the Deformed and Disgusting would not so often have been suffered to pass. "The world of art," said Jean Paul, "must be the highest, the most ideal, wherein every pang dissolves into a greater pleasure, and where we resemble men on mountain-tops; the storm which bursts heavily on the real life and world below, is to us but as a cooling shower. Hence every poem is unpoetical, as every song is unmusical that ends with a discord."† It is indeed another world, wherein our own is reflected, but idealized; and in its struggles and battles no blood flows from the wounded foot-soldier, but celestial *ichor* from a wounded god. This is triumphantly shown in music—

"Yearning like a god in pain,"

\* Monthly Repository, vol vii. p. 64.

† *Vorschule der Ästhetik*, b. i. And Shelley, "Poetry is a mirror which makes beautiful that which is distorted"—*Defence of Poetry*.

as Keats so beautifully says, where the most plaintive melodies—strains that move the heart to tears, are still always tempered into rapture by the pervading spirit of beauty. There is a song in the mind of every true poet which likewise tempers his painful thoughts; and the great poet is nowhere more recognizable than in this song, which gives him free movement in the absurdly called "*shackles*" of verse. Wherever you discern the "*shackles*," you may be sure the mind is a captive, and no golden eagle "wontoning in the smile of Jove." You discern the shackles by the "*fillings up*," by the irrelevancies introduced for the sake of a rhyme, etc.

If this be admitted, it strikes at the root of Wordsworth's theory of poetic diction, since the condition imposed of a beautiful medium, requires that the diction be not "the ordinary language of mankind," but a language fitted to the ideal mouths it issues from; and this must not be done alone by figurative, passionate, or personified phrases, but by an abstraction of all mean and ludicrous words. Certain associations cling round certain words, and the poet must comply with these; if they be ridiculous he must avoid them because the reader cannot escape the unlucky associations. Suppose a version of the *Iliad* opening thus—

"John Thompson's wrath to us the direful spring."

Or the "*Orlando Furioso*" thus—

"The Wilsons, Smiths, the Wigginses and Browns."

Yet this is scarcely an exaggeration on a sonnet of Wordsworth's, commencing—

"Spade with which Wilkinson has till'd his land!"

Now we defy the reader to be pleasurably moved by *Wilkinson*; the name is a name "*comme un autre*," and no doubt denotes many a respectable family, but the gods have not decreed it poetical; on the contrary, its abundant use by comic writers, coupled to its oddity as a sound, have consecrated it to fun, and not to poetry—sonnets least of all. *Wilkinson* is, therefore, a violation of the ideal. "*Achilles' wrath*" does very well. *Achilles* is an ideal personage, of whom, had we previously known nothing, we might predicate what greatness we pleased; but "*John Thompson*" is the name of our butcher, or who sat next to us in the pit last night, or sent a begging-letter—how *can* the name denote ideal character? It is useless arguing the point with the public: *Harry Gill* and *Betty Foy* do excite the ludicrous, and destroy all impression of poetry. Wordsworth is so insensible to this, or so obstinate in his theory, that he mingles risibilities and puerilities with magnificent and intense poetry.

We have now to consider it in the light of one *phasis* of a religious *Idea*.

No nation hitherto known has been without its poetry; but then does this potent universality indicate nothing? Has poetry had no other end

than the one actually alleged—amusement? or is it true, as is often said, that “the arts spring from the natural propensities of mankind, and fill up the idle hour of the savage as well as that of the more luxurious civilized nation?” This opinion, which could only have arisen in the mind of a dry logician, degrades Art to a mere doll and fancy-fair production; but fortunately the logic is as false as it is degrading. It is a confusion of means with an end. “The pleasure that the organ receives,” says Quatrèrè de Quincey, “is indeed one of the ends of art, since, if that pleasure did not exist, the action of the art itself would be as if it were not. But that such can be its true end, is one of the errors arising from ignorance and thoughtlessness: as well might it be maintained that the pleasure derived from eating is the end of that want, while it is surely nothing more than a means of attaining another pleasure, that of health, strength, and the use of our faculties. The pleasure is a means which nature herself has placed as an incentive to those appetites, that lead the way to the accomplishment of all her designs.”\*

The opinion often advocated in Germany and France, of “Art for Art’s sake,” of Art’s knowing no end beyond itself, is a little better, but we think equally incorrect, and equally confounding means with an end; for in looking narrowly at the history of poetry, we find every where one determinate element and condition, which we hold to be the soul of Art, and this is its religious Idea. Every poet stands at the head of his age at once its child and prophet; and the psalm which breaks solemnly from him, however varied by the music of his feelings, ever retains the one burden—*elevation of the race he addresses into a higher sphere of thought.*

“The muse,” says Sir Walter Scott, “records, in the lays of inspiration, the history, the laws, the very religion of savages. Hence, there has hardly been found any nation so brutishly rude as not to listen with enthusiasm to the songs of their bards, recounting the exploits of their forefathers, recording their laws and moral precepts, and hymning the praises of their deities.”† Be it observed, that so far from poetry being the “mirror of ideas eternally true,” it must, on the contrary, ever be the mirror of *truths of periods*, because the poet cannot but see through the medium of his age, cannot see much beyond it, but must inevitably, if he would get a hearing, utter its spirit and wisdom in their highest point. What is truth? how is it to be stamped with eternity? where is its criterion? The truth of to-day is the doubt of to-morrow; how then can the poet get at this eternal truth? That which alone is eternally true to human cognizance, is human passion, and this is the ever-green of poetry. The wild war-song of the savage is undoubtedly poetry; and although the barbarity, cunning, and ferocity it praises and inculcates are, to an advanced civilization, very revolting, they are

\* On Imitation in the Fine Arts, Transl., p. 180.

† Introduction to Border Minstrelsy.

to the savage the highest wisdom. "Celebrare res præclare gestas ac virorum fortium virtutes antiqua fuit Arabibus consuetudo. *Neque est ullum potseos genus utilius: nihil enim est præstabilius quam animum ad virtutes impellere atque incendere, nihil porro ad eum finem consequendum efficacius, quam ea proferre exempla, quæ lector admiretur et sibi imitanda proponat.*"\* To the same effect the admirable old dramatist—

"How it doth stir the airy part of us  
To hear our poets tell imagined fights,  
And the strange blows that feigned courage gives!  
When I Achilles hear upon the stage  
Speak honor, and the greatness of his soul,  
Methinks I too could on the Phrygian spear  
Run boldly, and make tales for other times."

Homer expressly states, that glorious actions and noble destinies are the substance of poetry;† and Pierre Vidal, the celebrated Troubadour, in his advice to one of his brethren as to the mode of exercising the profession, also teaches this. He considers it as the store-house of universal philosophy, and the cultivation of high sentiment; that it is the bond of union between heroes, and that the duty of the Troubadour is to awaken in the next generation the high sentiments which had been the glory of their forefathers.‡ "Even our Saviour," says Sir Philip Sidney, "might as well have given the moral common places of uncharitableness and humbleness, as the divine narration of Lazarus and Dives, or of disobedience and mercy, as the heavenly discourse of the lost child and gracious father; but that his thorough-searching wisdom knew that the estate of Dives burning in hell, and Lazarus in Abraham's bosom, would more constantly, as it were, inhabit both the memory and judgment."§

These citations, which might be indefinitely multiplied, are sufficient to show how impressed men have been from all times with the great moral influence of poetry; but this moral influence in final analysis becomes a religious Idea. By a religious Idea we do not mean the formalized religion of the epoch, nor even an acknowledged part of it, but *more Germanico*, regard every Idea as partaking essentially of the religious character, which is the formula of any truth leading to new contemplations of the infinite, or to new forms in our social relations. Thus liberty, equality, humanity, (the three-fold form of this century's mission,) are not, so to speak, "doctrinal points" in the formalized religion of the epoch; but inasmuch as they express (in the final analysis) the object and faith of the crusade in which all Europe is now sensibly or insensibly engaged, and as they have to complete a great social end, so may they be considered as eminently religious. We caution the reader against any

\* Sir W. Jones's *Poes. Asiat.*, cap. xvi.

† Compare *Il. vi. 358*; *Od. iii. 204, xxiv. 197, &c.*

‡ Sismondi's *Lit du Midi*, i.; see also *Millot*, ii. p. 283.

§ Defence of Poësy.



narrow or exclusive interpretation of our expressions ; nor must he be hasty in making his application of them. We admit that the poet does not give to this Idea its naked expression, or is he even conscious of it ; such is the task of the philosopher. Moreover, although we use the word Idea in its highest abstract sense, as expressing *potentially* the whole spirit of the age, yet we are aware of how many antagonistic different elements it is made up, and consequently each poem will mostly contain but one or more of these elements ; not the entire Idea. But this may become clearer after the following remarks.

The most ever-present manifestation in the history of poetry, is its immediate connexion with religion. Hymns, sacred traditions, prayers, and passionate aspirings, and hopes for the future, form the staple of all antique poetry. "Art," says Dr. Ulrici, "is in its origin ever one with religion—a proof of its Godlike origin, *as a mediate and secondary revelation.*"\* Not only in its *origin*, it is in its essence one with religion ; and its deviation from its sacred office, as civilization progresses, is only *apparent*, for the end of both must ever be one and the same. The end of religion, universally considered, is, not its *speculative belief*, but its *practical result* ; the translation of that hieroglyphic alphabet of *faith* into its corresponding symbols of *action* ; thus leading mankind to a higher, purer state of being, than the uneducated instincts and unrestrained passions ever could attain. Such is also the end of poetry, pursuing that end however through the Beautiful. It captivates rather than dogmatizes ; instead of purifying the soul by means of fasts, penances, and prayers, it works its end through the emotions. Religion also works through the emotions, but it must assume the dogmatic, positive form, and must call in to its aid the understanding, (i.e.) philosophy, thereby addressing the intellect. Majendie defines the passions as "the triumph of the viscera over the intellect ;" it is equally the province of religion and poetry to attain the triumph of the moral over the physical man.† "In poetry," says Dr. Lowth, "you have the energetic voice of virtue herself. She not only exhibits examples, but she fixes them in the mind." The learned Michaelis, in his notes on Lowth's "Hebrew Poetry," observes, "There are, however, some poems which only delight, but which are not therefore to be condemned ; some which, though they contain *no moral precept*, no commendation of *virtue*, no sentiment curious or abstruse, yet dress and adorn common ideas in such splendor and harmony of diction and numbers, as to afford exquisite pleasure ; they bring, as it were, at once before our eyes the woods and streams, and all elegant objects of nature." Here the learned scholar

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\* Ulrici, Shakspeare's Dramat. Kunst., p. 1.

† We have before cautioned the reader against narrow interpretations of our expressions. By religion here we do not mean the Christian only, but every religion of which we have knowledge. We are here neither confounding nor separating the true from the false, but simply stating to what all equally pretend. In the same way we speak of all poetry, not of any one class or of any one period. Indeed our speculations are purely abstract.

has not seen deeply enough, he has not reduced these questions to their final analysis; for such poems, without *positively*, dogmatically teaching any moral truth, yet *indirectly* establish the end of all morality. The office of poetry is not *moral instruction*, but *moral emulation*; not doctrine, but inspiration. The very fact of rendering us enamored of existence, by pointing out the endless beauties squandered at our feet, and mostly trampled on by our dull pre-occupations of business or idleness, is sufficient. Furthermore, all poetry need not be epic, or dramatic; there are glow-worms as well as stars, and as these small but brilliant lights do form a small part of the great nature, so, as before hinted, the various elements which constitute the idea must be represented, reproduced. Even in the sterner forms of religion herself, graceful and joyous hymns are admitted, and constitute indeed a part of the worship. But let us hear Hegel on the object and aim of art.

"It is its object and aim to bring within the circle of our senses perceptions and emotions, everything which has existence in the mind of man. Art should realize in us the well-known saying, '*Nihil humani a me alienum puto.*' Its appointed aim is—to awake and give vitality to all slumbering feelings, affections and passions; to fill and expand the heart, and to make man, whether developed or undeveloped, feel in every fibre of his being *all* that human nature can endure, experience and bring forth in her innermost and most secret recesses; *all* that has power to move and arouse the heart of man in its profoundest depths, manifold capabilities and various phases; to garner up for our enjoyment, whatever, in the exercise of thought and imagination, the mind discovers of high and intrinsic merit, the grandeur of the lofty, the eternal and the true, and present it to our feeling and contemplation. In like manner, to make pain and sorrow, and even vice and wrong, become clear to us; to bring the heart into immediate acquaintance with the awful and terrible, as well as with the joyous and pleasurable; and lastly, to lead the fancy to hover gently, dreamily on the wing of imagination, and entice her to revel in the seductive witchery of its voluptuous emotion and contemplation. Art should employ this manifold richness of its subject-matter to supply on the one hand the deficiencies of our actual experience of external life, and on the other hand to excite in us those passions which shall *cause the actual events of life to move us more deeply, and awaken our susceptibility for receiving impressions of all kinds.* For we do not here require absolute experience to excite these emotions, but only the *appearance* (*Schein*) thereof, which art substitutes for sheer reality. The possibility of this illusion, by means of the representations of Art (*Schien der Kunst*), rests upon this, that *every reality must pass through the representative medium* (*i. e.* that we know things *mediately* by *ideas*, not *things*) before it can be cognized by the mind, or acted on by the will, and therefore it is immaterial whether we are acted on by external, immediate reality, or receive our impressions through other means, viz., pictures, signs, or forms, which represent the qualities of this reality. Man can also picture to himself unreal things, as if they absolutely possessed reality. Therefore, whether we receive the impression of a situation, a relation, or the subject-matter of a life, through the medium

of external reality, or only through the representation of it, in both cases we are sufficiently affected to sorrow and rejoice, to be moved or agitated according to the nature of the subject, and in both cases we run through, in quick succession, the feelings and passions of anger, hate, pity, anxiety, terror, love, esteem, wonder, honor and fame.\*

Art then, we see, is the reproduction of the spiritual world in a beautiful and pleasurable shape; it is the "interpreting tongue" in the fine remark of Horace:

"Format enim natura prius nos intus ad omnem  
Fortunarum habitum; juvat aut impellit ad iram;  
Aut ad humum mœrore gravi deducit, et angit:  
Post effert animi motus interprete lingua."

"For," says Hegel in the same spirit, "even in tears lies consolation. Man, when entirely absorbed in his sorrow, demands at least the outward manifestation of this inward pain. But the expression of these feelings by means of words, pictures, tones and forms is still more softening; and therefore was it a good custom of the ancients to have female mourners at deaths and burials, as it brought grief into contemplation in its external form; or more especially as it showed the mourner his own grief expressed by others. For thus the whole subject of his sorrow would be brought under his view, and he would be compelled, by its frequent repetition, to reflect upon it, and so would be relieved. Thus abundant tears and many words have always been found the surest means of throwing off the overwhelming weight of sorrow, or at least of relieving the oppressed heart."

But while advocating the opinion that poets are and ever have been *δαίδαλοι σοφοί*, that poetry must have some end beyond amusement, some ideal beyond itself, we must protest against the dogma of its being "a moral teacher," and of always demanding the "moral" of a work of art: such a theory may be very suitable to the select "academies" where youths "receive religious and moral instruction—singlestick if required," or may serve to bind up with Blair's Lectures, but is suitable to nothing else.

"The moral effect of works of ideal art," writes Mr. R. H. Horne, himself both poet and critic, "is humanizing chiefly because they excite refined emotions without advocating any exclusive or dogmatic moral. Their true mission is to enlarge the bounds of human sympathy. It was universally the custom in this country, till within the last few years, to ask, 'What is the moral of the piece?' The answer was always absurd or infantine; frequently turning upon the 'naughty' parts of the story, or some quotation from a school catechism of maxims, or a common proverb, but more commonly one of the ten commandments; which latter in a Christian country, we should have thought might have been taken

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\* *Æsthetik*, b. i. Einleitung, p. 60.

for granted, without so many illustrations. What is the moral of Othello? An instructive grandmother would obviously say, unequal marriages are dangerous, or you should not kill your wife from jealousy. What of Lear? We ought not to be unreasonable, exacting and passionate when we grow very old; or we ought to be too prudent to give away all our property before we die.\*

And Hegel, who willingly recognizes the fact that "Art was the first teacher," argues at length the untenable and faulty positions occupied with respect to its aim as a moral instructor,† contending that all dogma, all philosophy in art, should be *implicit*, not *explicit*; admirably observing, "From every genuine work of art a good moral is to be drawn; but then this is a *deduction*, and indeed entirely depends upon *him* who draws it." It remains then to be seen *what* the essential position of poetry specially is; and in how far it may be regarded as "the beautiful phasis of a religious Idea."

Religion, philosophy and poetry, intimately as they are connected, have nevertheless distinct forms of existence, and the distinction is almost universally considered to be one of *essence*. We hold, on the contrary, that they are but the threefold form of the Idea,‡ that they are *identical* (in the philosophical meaning of that term) in their subject-matter, but that the various spheres into which their respective elements have forced them, have caused them to be considered as various in their essence. It has been well shown by Ritter, in his "Geschichte der Philosophie," that were religion to acquire a *scientific accuracy of statement*, it would of necessity cease to be religion, and become philosophy. But religion invariably and necessarily announces its dogmata as at *once established and determined by revelation*, on the authority of which they possess immediately on their announcement an irresistible claim to assent. Philosophy, on the other hand, draws its assent, its faith from cautious *reason*; it is continually impelled to comprehend every ascertained result in its dependence and co-ordination to the universal tendency of reason towards knowledge.

"A toutes les époques de la civilisation règne une pensée obscure, intime, profonde, qui se développe comme elle peut dans l'élément extérieur de cette époque, dans les lois, dans les arts, la religion, lesquels sont pour elle des symboles plus ou moins clairs, qu'elle traverse successivement pour revenir à elle même, et pour acquérir de soi une conscience et une intelligence complète, après avoir épuisé son développement total. De cette conscience et cette intelligence, elle ne l'acquiert

\* "Essay on Tragic influence," prefixed to his noble tragedy of Gregory VII.

† Vide Æsthetik, i. Einleitung, p. 66--73.

‡ Hegel's *Grund-princip* is very similar, though we met with it long after our own was elaborated, and the coincidence is curious. He says, "Bei dieser Gleichheit des Inhalts sind die drei Reiche des absoluten Geistes nur durch die *Formen* unterschieden, in welchen sie ihr Objekt, das Absolute, zum Bewusstseyn bringen."



que dans la philosophie. *C'est la philosophie qui se charge pour ainsi dire, de la traduire en une formule abstraite, nette, et précise.*"\*

To this let us add what M. Jouffroy† says of poetry and philosophy :

"The former gives utterance in song to the sentiments of the epoch on the good, the beautiful, and the true. It expresses the indistinct thought of the masses in a manner that is more animated though not more clear, because it feels this thought more vividly, but comprehends it as little. This is comprehended only by philosophy. If poetry comprehended it, poetry would become philosophy, and disappear. The true poets are always children of their age. The philosophers always are so in regard to their point of departure; but as we before said, it is their mission to take the lead of the age, and prepare the way for a future [also the poet's mission.] They share the sentiments—this is their point of departure; they reflect upon them, they comprehend them, they express them—this is their work. Then, and by these means, the epoch comprehends what it loves, what it thinks, what it wishes for; its idea is reduced to a symbol, and with all its power it then tends to its realization."

To a similar effect Carlyle—

"He who should write a history of poetry would depict for us the successive revelations which man had attained of the spirit of nature; under what aspect he had caught and endeavored to body forth some glimpses of that unspeakable beauty, which in its highest clearness is religion, and which in one or other degree must inspire every true singer, were his theme never so humble."‡

And Hegel thus explicitly states the relation of the three :

"Art fulfils its highest mission when it has thus established itself with religion and philosophy in the one circle common to all, and is merely a method of revealing the Godlike to man, of giving utterance to the deepest interests, the most comprehensive truths pertaining to mankind. In works of art nations have deposited the most holy, the richest and intensest of their ideas, and for the understanding of the philosophy and religion of a nation, art is mostly the only key we can attain."§

"And finally Shelley, in his most profound and beautiful "Defence of Poetry," recently published :—||

"Poets are not only authors of language and of music, of architecture, of statuary and painting, they are the institutors of laws and founders of civil society, and the inventors of the arts of life, and the teachers who

\* Cousin, Cours de Phil., i.

† Essays on Philos. of Hist.

‡ Miscellanies, vol. ii. p. 256.

§ Ästhetik, b. i. Einleitung, p. 2.

|| "Essays and Letters from Abroad;" a work no admirer of the poet should be without.

draw into a certain propinquity with the beautiful and true, that partial apprehension of the agencies of the invisible world which is called religion. Poets, according to the circumstances of the age and nation in which they appeared, were called in the earlier epochs of the world, legislators or prophets. *A poet essentially comprises and unites both these characters*; for he not only beholds intensely the present as it is, and discovers those laws according to which present things ought to be ordered, but he beholds the future in the present, and his thoughts are the germs of flower, and the fruit of latest time. *The most unfailing herald, companion and follower of the awakening of a great people to work a beneficial change in opinion or institution is poetry.* Poets are the hierophants of an unapprehended inspiration; the mirrors of the gigantic shadows which futurity casts upon the present; the words which express what they understand not; the trumpets which sing to battle, and feel not what they inspire. *Poets are the unacknowledged legislators of the world."*

We have cited these passages for the weight of their authority; when we consider how far different the men, the nations, the habits of thought, and the philosophy from which they sprung; Ritter, Cousin, Jouffroy, Carlyle, Hegel, and Shelley, it would be difficult to select names more opposed thus agreeing. They all, as it seems to us, felt and expressed very vividly separate portions of the truth; an eclectic patience evolves the whole of the truth, *i. e.* that "poetry is the beautiful phasis of a religious Idea." The poet must ever be the great teacher of his age; he stands at the altar, rapt, holy, impassioned, prophet-like, giving utterance to the inarticulate yearnings, feelings and wants of his brethren; embodying their tendencies, mirroring all and mirrored in all the age produces; the myriad hopes and doubts that sway their minds to and fro, break forth from his lips in passionate music. He speaks in beauty, but mistake not that beauty for his end! Assert no such atheistic, epicurean creed! He makes you in love with the truth and virtue which religion has *ordained* and philosophy *proved*; he sets before you splendid pageants of heroic endurance, of patient suffering, of unexampled fortitude and struggling; he reveals the riches lying within you and around you, in the exercise of your soul in the free converse with nature; he points to a future brighter than the past, happier than the present; he couches your eye from the thick film of selfishness, and by keeping the ideal to which all aspire constantly before your eyes, he leads you to the goal of religion, and opens in your heart the wellspring of happiness; happiness which is as the psalm of thanksgiving from man to nature; the realization of that righteousness, of which it is written, "all its paths are pleasantness, and all its ways are peace." Thus the three Ideas of faith, science and virtue become realized in religion, philosophy and art. "Je définis donc la métaphysique *l'idée de Dieu* et la poésie *le sentiment de Dieu.*"\*

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\* George Sand, "Les Sept Cordes de la Lyre." And Hegel says, "Da wir von der Kunst als aus der absoluten Idee selber hervorgehend gesprochen, ja als ihren Zweck die

If our theory be false, if there be no idea lying beneath the expression, and if poetry be the mere expression of feeling for feeling's sake, how comes it that all times do not alike produce poets? How is it that poetry arises in cycles, gets its doctrine uttered by half a dozen men, and then slumbers for centuries, to arise again with pristine vigor? *Accident* is a favorite theory, but an untenable one. Look at history, and see if the indications be not too universal and too regular for accident. It has been repeatedly remarked, that it is not in times of luxurious idleness and fat peace, but in those of conflict and trouble, that the arts have been most flourishing. Look at Athens, that perpetual struggle of men. Look at Italy in the days of Dante and Petrarca, distracted by factions, wars and contentions of all kinds. Look at England under Elizabeth and James, (which was the new birth of an era; Protestantism accepted and believed after its fierce struggle,) also after the Rebellion, and after the French revolution. Wherever you cast your eyes, the same phenomenon presents itself. The reason is, that *every revolution or internal change is the birth of a creed which is felt by the whole mass*; the philosophers have long known the ideas contained therein, but the revolution is the result of the participation of the mass of mankind; the poet arises to utter the collective creed, with its hopes for the future. He does not, as we before hinted, give this Idea its naked expression; and indeed (unless the word poet be used as the abstract and expression of the whole voice of poetry at any time) he does not either feel or comprehend this Idea in its completeness, but only in one or more phases thereof: hence the necessity for more than one singer; hence Wordsworth, Coleridge, Shelley, Byron, Rogers, Campbell, Keats, Moore, Crabbe, etc., were each necessary to the completing of the Idea of their epoch; and hence also the reason of the crowds of imitators, successful and otherwise, who walk in the footsteps of a newly arisen poet. Their inarticulate yearnings and thoughts they have found articulate in his works, and they join their voices in the plaintive wail, the Titanic struggle, or jubilant hope, uttering *similar* thoughts rather than imitating his. Every man that has a real insight of more or less depth, is something more than an imitator; for he helps to complete that portion of the Idea at which he works. An Idea is not the work of one man, but of many; not of one day, but of an epoch; and each one gives it his own imperfect formula. The great poet may feel it in its totality more intensely than another, but no one man can complete it. If then, as Hegel says, the key to the philosophy and religion of a nation is to be found in its poetry, so we may reverse it, and say that the philosophical Idea of an epoch being given, we have at once the key to its poetry. Indeed, no criticism on a past epoch's poetry can be significant without a clear conception of the dominant Idea

*sinnliche Darstellung des Absoluten selber angegeben haben,"* which is the metaphysical expression of our opinion, "the representation of the godlike or of the idea," seems the very formula wanted; and the *hervorgehend*, does it not also express the *varieties*, i. e. nature (*Idee*) working through her various gradations and phases, and thus presenting different aspects, to which artists successively give *die sinnliche Darstellung*?

of that epoch, and it is owing to the neglect of this that so much nonsense has been written on the ancients. Let us not be misunderstood: we repeat again and again, that the poet does not, cannot give the scientific accuracy or expression to the Idea—this is the province of philosophy; but the *Idea must ever, in one of its grand or minute phases, be the basis of his poem*; and moreover as there are many conflicting Ideas in every epoch, the various poets will severally express them, but the dominant one alone carries immortality with it.\*

Holding these opinions, we cannot but look favorably on the fact of the march of intellect having been followed by the diffusion of poetry, and however we may be for the moment irritated at the self-sufficiency and presumption of the *dii minores*, whose verses manufactured for the day are forgotten on the morrow, and whose "pretensions widen every smile their imbecility excited," because such pretensions must always be ridiculous; yet apart from these, no one, we think, can be indifferent to the daily increasing influence and production of poetry. As religion in earliest times was expounded by a few priests, and was *understood* by them alone, but has now, through its Christian development, become intelligible and practicable to millions; so poetry, in becoming thus diffused, is developing its mission, widening its influence, and daily becoming a more potent element of life. Most foolish is the cry, "that poetry is dead," or "poetry's a drug." Poetry never dies, never becomes a drug, and least of all now, when every day brings fresh writers, and every day republications in all possible forms and at all prices, of all possible writers. The glory and intense apostolic radiance may have become dim, because there is no new creed to breathe fiery inspiration into the nostrils of men, and poetry is occupying herself in the lower province of *completing* her Idea; but that it exists, that it revels in its superabundant life, can only be denied by those unfortunates for whom the steep of Parnassus remains a steep—the earth crumbling beneath their heavy feet. Nevertheless the meanest cultivator, whether he attain Parnassean eminence or not, has glimpses of that infinite to which all aspire, regards nature with a more penetrating and appreciating eye, looks radically at the soul of man in preference to his conventional trappings, cultivates the affections and sympathies, and develops the philosophy of beauty and happiness more than another. It is nothing to say that he is but an echo or re-echo of others; admitting it, we only thereby assert his relative *rank*, and negative the probability of his becoming an object of *renown*; but as far as his own soul is concerned, it is much for him that it is not dead, not wrapped up in the dull atmosphere of self-reference and "respectability," but that the air of heaven can blow freshly on it; that it can admit "the strains

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\* It will have been apparent that we have used the word "Idea," in its European philosophical sense, as the synthetical expression of each great element of the spirit of the age. Thus analysis was the dominant Idea of the eighteenth century; humanity (liberty, progression) of the nineteenth. Feudalism, monarchism, protestantism, catholicism, etc., are but formulas which we name Ideas.



of higher mood," which burst from the chorded harps of the great minstrels who have gone before, and filled the world with music unto everlasting time ; it is much for him that he can catch up even a distant falling echo of these strains, and temper their celestial harmony to the "ears of the groundlings," who could not otherwise have heard them. Poetry will one day become one of the elements of life---a sixth sense more keen and important than all the rest.

"Ernst ist das Leben, heiter ist die Kunst."

But it is a noble dream, if a dream, to elevate life itself into the spiritual clearness and ideality of Art. Deep and beautiful is the advice of Goethe, that we should "every day hear a little song, see a good picture, read some poetry, and, if possible, talk some sensible words," that we may thus cultivate a harmony of soul, which must eventually express itself in life ; and so Montaigne's father used to awaken him in the morning by playing on the flute, in order that he might begin the day with cheerfulness, and one slight beam of beauty. Nevertheless if, as Goethe says, "what we do not *understand*, we do not *possess*," so the more poetry becomes a familiar household thing, garnered up in the hearts of the masses, not shut in libraries of the rich, the more necessary it is for us to *understand* it, unless indeed we regard it as the stars,

"Too high for knowledge, but how near for love !"

But to understand it is the office of æsthetics and criticism ; and if there be any truth in what we have written, a noble office it is. Criticism is the handmaiden to Art, the gentle and affectionate sister (philosophy) comprehending and knowing what poetry *feels* and *utters*. But this gentle sister, has somehow or other fared most sorrowfully in this merry and moral England of ours ; she has been bullied by her brother, snubbed by her enemies, ill-treated by friends, and poisoned by quacks. Her brother, poetry, (in the form of heaven-descended, unsuccessful genius, in turned-down shirt-collars,) has bullied her in unmeasured terms ; "cold criticism," "rules cramping genius," "envy of critics," etc., have been the most courteous terms. With these ingrates who thus ill-use their critics out of a resentful sense of their own shortcomings, we shall argue the point about "rules cramping genius," or "learning damping poetic fire," previous to our introducing them to their high-soul'd sister in Germany, from whose Minerva-head streams a light somewhat differing from that of the Minerva-press.

We are aware, that in obscure corners originality is supposed to be obtainable through ignorance alone ; knowledge, criticism, etc., being mere weights and obstructions to the free exercise of the poetic spirit. This does very well in rhetoric, indifferently so in logic. And then suppose we choose to reject the illustration of "weights" applied to

learning, and substitute "wings" for it, is not the whole argument changed? And yet an arbitrary illustration can never affect the truth of the thing. Men are the dupes of epithets. Affix an epithet to your neighbor's actions or sentiments, and they share the fate of the dog in the proverb, and are virtuously hanged. Call reason or understanding "cold," and they become, as if by magic, degraded and brutified in the eyes of men; while "warm" imagination or "exalted" fancy are revered by every turn'd-down collar in the kingdom. Epithets are thus made the weapons of bigotry, the shields of conventionality, and the watchwords of superstition!

We insist therefore on an inspection of the epithet "cold," when applied to understanding; we insist on knowledge, rules of art, etc., being no longer called "damps, weights, or obstructions," until further examination. It is merely a dispute about words, as all disputes indeed are; men not looking steadily at the thing, but looking only at their conception of it, and each man insisting on the other seeing with his eyes. Mere verbal learning, or what is usually known as academic learning, can certainly be of no great use to the poet, if he also share the academic reverence for trivialities in " $\mu$ ." Learning, in the common acceptation of the word, is the driest, barrenest dust that can be shaken from long-shelved folios, and collected under the skull; but here again that shifty Will-o'-the-wisp, epithet, has led us dancing into a bog, instead of the broad path of reality. Men have consented to call one thing alone "learning," viz., the Greek and Roman literatures. In effect, however, there is learning beyond this, and such, usually called knowledge, the poet *must* have, if he would gain the world's ear; and the better, if strengthened and refined by an acquaintance with the language and the almost perfect relics of antiquity. Learning is as oil poured upon water, which rests glittering at the top, and can be *shown*, and its amount estimated, at a moment's notice; but unfortunately without changing the condition of the water itself. Knowledge is as wine poured upon water, which cannot be so readily shown and separated, but which mingles with the water, vivifying it with its own intense life, and changing it into quite another existence. Poets, mistake not oil for wine!

Shakspeare, it is possible, was unable to conjugate a Greek verb without bungling, but that he "was wise in all the wisdom of his time," can be doubted by none. His appetite for knowledge was insatiable, and "grew with what it fed on." Everything was welcome to him, high and low, and was turned to good account. How remarkably this was the case with Gæthe we all know. That Homer, the Greek dramatists, Dante, Petrarch, Boccaccio, Tasso, Chaucer, Milton, Spenser, Shelley, Coleridge, Wordsworth, Gæthe, Schiller, etc., were all impressed with the necessity of mastering, as far as in them lay, all knowledge, is equally plain; for, in a word, how can he, whose position is at the head of his age, be *behind* that age?

With regard to that theory invented by idleness and conceit—of rules cramping genius, the chilling effects of criticism, and the necessity for

the artist's being *ignorant* of his art—how does this accord with past experience? Is not a great poem the work of years? Was Dante, who formed his language, careless of his art? Did he not see himself "growing grey" over his *Divine Comedy*? "Creation, one would think, cannot be easy," says Carlyle; "your Jove has severe pains and fire-flames in the head, out of which an armed Pallas is struggling!" Was Chaucer indifferent to the critical demands of his art?—was Spenser?—was Shakspeare? The biographies of poets give very explicit statements of the labor and study which their poems cost them. Ariosto was twelve years writing his "*Orlando Furioso*," and after it was published, travelled all over Italy to converse with the critics upon it, profiting by their advice; and it will live for more than twelve hundred years. Tasso had a scholar expressly to elucidate Aristotle's "*Poetics*," and studied them with avidity; his own "*Discorsi*" on epic poetry show how long and carefully he had meditated the subject. Only look at the question for an instant, and it resolves itself. An artist has a certain aim; to attain this he must use certain means; is he to be ignorant of them for the better employment of them? He must not only ascertain correctly the nature, power and limits of these means, but must apply them to his own wants. Now rules in poetry are nothing more than conclusions arrived at by critics for the best means of attaining this end.

But heaven-descended genius has one immense rock on which it reposes its contented ignorance—one never-failing argument—the *Greeks*! "The Greeks never wrote with the fear of critics before their eyes; they had no cold rules which they were afraid to violate." Such is the confident announcement, such is their rock; unfortunately for them it is no rock, but a mere sand-hill converted into a rock by being viewed through the mist of ignorance,—a mist favorable and familiar to weak eyes. This rock is scattered into air by these two facts,—the Greeks had abundant scientific æsthetical treatises, and they had always a highly critical audience.

The history of Grecian æsthetics has been elaborately treated by Müller, Bode, Ruge, and others\*; and although time has left us little beyond the titles of works, yet they alone indicate the advanced state of the science; and when we consider the profound philosophical genius of the people, their acute susceptibilities, and their passionate love of Art, we may be assured that their treatises were not only full of deep speculation, but also of suggestive matter to the artist. One thing strikes us throughout Grecian Art, and that is, the consciousness of its art; the well-considered, elaborated and calculated adoption of materials. Except in Homer, whom we regard, in spite of the critics, as bald, (simple, if they will; but the simplicity of primitive poetry, not

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\* Vide Müller, "*Geschichte der Theorie der Kunst bei den Alten*" (a work much valued, but which we have been unable to consult). Bode, "*Gesch. der Hellenischen Dichtkunst*;" the introduction to which contains a short but elaborate account of the different critical theories; and Ruge, "*Platonische Æsthetik*."

the forethought simplicity of Art,) the most glowing burst of poetry with them has not a *spontaneous* look; and hence Goethe compared Greek Art to a volcano burning beneath a covering of ice; and this "coldness" has been universally felt; nor is the difference of religion and customs sufficient altogether to account for it, since even in sculpture (and that too in the purely human phases of it), which bears least visibly the imprint of a nation's spirit, a certain coldness strikes the beholder at first sight. This is indisputable, and we believe it to be greatly owing to the absence of that spontaneous air which ideal art must induce. These considerations render us very curious on the subject of their æsthetics.

How early Art was regarded by them as an object of speculation, we have no trace. Scattered remarks upon its nature, end and laws are to be found in their oldest poems; but in these we only find an artistic, not a philosophic comprehension of the subject. The philosophers, however, soon opened the field of inquiry, and their results were at length reduced by Pythagoras to mathematical principles. Pindar was instructed by Lasos, author of the oldest work on music possessed by the Greeks\*; and Democritus wrote no less than ten treatises, which comprehend almost the whole region of Art; viz., on Poetry, Rhythmus, Harmony, Beauty of the Epic, Homer, Song, Diction, Painting and Perspective. Democritus was the first who opposed the opinion that poetry was a mere facility, which, like rhetoric, could be learnt by repeated exercise; showing it to be a madness (*μανία*) a being possessed by the God (*ἐν θεῷ*), the obeying of an in-dwelling, but unconscious and divine impulse†; "for they do not," says Plato‡, "compose according to any art which they have learnt, but from the impulse of the divinity within them."

Plato's æsthetical views the reader will see collected and expounded in the before-mentioned work of Ruge. We shall only mention the profound insight indicated in the passage at the end of the "Symposium," that "the foundations of the tragic and comic arts are essentially the same;" we say indicated, because he has stated it so loosely, that we cannot accept it in his own words. The tragic of necessity contains within itself the comic *capability*; but the converse does not hold. Passion which suffers, and imagination which irradiates every side of things, saturating the surface as well as piercing to the core, can, from their very intensity and illumination, comprehend in their glance, both the congruous and incongruous, the eternal and the accidental, the earnest and the ludicrous. But wit, which sees only the resemblances of surface, or humor, which sees only the incongruities of things, by not *undergoing*, not seeing all, but only a part of things, can never produce

\* Suidas, 227.

† Hor. ad Piso, 295; Cicero de Divin., i. 34. This is the *θεῖος θράσος* Dio. Chrys. 35) *ἐνθεοταεισμός καὶ ἐκπὸν πνεῦμα* (Clem. Alex.), which Democritus demands of the real poet, and which he, like Plato, expressed by poetical madness.

‡ Ion.



the tragic. For when the congruous or the earnest are known, the incongruous and ludicrous are (according to Kant) also known with them; the departure from the one gives the other. Yet the congruous is not the *other* aspect of the incongruous, nor does the conception of the latter involve the former; for, the congruous has but one form, the incongruous many. The tragic poet then can be comic: for, conceiving the grandeur of action, he can also conceive the littleness of action: but the comic poet does not necessarily include the tragic, inasmuch as the conception of the littleness of an action does not positively include a clear, pure conception of the grandeur of it.

The treatises of Aristotle and Longinus are too well known to be here spoken of. But Greece perished—the Porch and the Academy were no more; and from that period until 1729, (when nature gave birth to one of her giant pioneers, known to men as Gottlob Ephraim Lessing,) æsthetics slept the long sleep. Dim ghosts occasionally “visited the glimpses of the moon,” proclaiming themselves the unmistakeable “buried majesty of Denmark,” but they vanished at the cockcrow of inspection. Without waging a bloody and heroic war with the already slain, we may at once assert, that such a thing as æsthetical criticism was not known, and that the treatises then believed in are buried beneath the weight of their own dust. One fact they do represent, viz., that criticism has always been co-existent with Art; and now the question resolves itself into this second one—whether it be better for the artist that criticism should be good or bad? If bad, then stick to your Batteux and Blairs; if good, then must it be sought elsewhere; and English echo answers, “where?”

But here a no less remarkable question presents itself:—if Art has done without good criticism so long, what need of it now? No one has put this question, and yet it is a very plausible one. We answer—because Art is the flower of its age; because it must *now* spring out of a different soil,—a more critical and conscious one. The manifestations of Art in this century cannot possibly be the same as those of any other century; it must use other means, other formulæ, because its audience differs in ideas from any other.\* We take it to be the radical error of artists, that they do not distinctly set before themselves not only their *object*, but the requisitions of the age. Accustomed to live among the works of the past, to breathe their atmosphere, and to consider them as perfection, their whole endeavor is to reproduce those types, which they do in a lifeless, soulless form. They forget, that even in our most unfeigned admiration of those relics of antiquity, we always *make allowance* for the difference. We have no faith in their ideas, but we see that they themselves had, and it is enough; but when a modern

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\* Hence the above question is half answered. However we may admire Shakespeare, Spenser, Dante, etc., one thing is certain, that they fulfilled the critical demands of their age, not of ours; were their poems to appear to-morrow, they would be universally condemned as irregular, crude and deficient in art. To us they are classics.

would reproduce these types, he fails : first, and most signally, from a want of faith in the ideas he symbolizes ; and, secondly, from our representing as an untruth, an impertinence, any resurrection of these ideas long buried in the grave of time. His chance of success is proportioned to the relation between the ideas of that time and ours. The true Greek ideas, for example, can never effect us. Those of the middle ages will do so more or less, but never completely. We are aware of the existing cant about the ancients, but are convinced, that if the *Minerva*, and the *Moses* of Michael Angelo were produced for the first time by modern artists, precisely the same as they now are, all unprejudiced persons would award the preference to the *Moses*, though feeling both of them to be incomplete. The connoisseurs, *i. e.* those who know least but cant most about the matter, would of course detect the Græcism of the *Minerva*, and so award the preference because it was Greek.

The revival of art is fondly talked of, passionately hoped for by some, but the *means* are not so ready at hand. One proposes the abolition of "academies ;" another, "severe study of the ancients ;" a third, "protection and patronage of government," et omne quod exit in *um*, præter *remedium* !\* We do not propose æsthetics as the panacea, but we do firmly believe it to be a very necessary ingredient ; for, as we said, this is a critical and conscious age, and its Art must therefore inevitably partake of this spirit. "That which a work of art," says Hegel, "beyond the immediate enjoyment, in these days, should satisfy in us, is our *judgment*, because we bring under our scrutiny and contemplation the subject matter (*Inhalt*) and its representative forms or symbols (*Darstellungs-mittel*), and the fitness or unfitness of the one to the other. We ask, is the subject good ? is the treatment good ? and are they mutually conformable ? Hence the philosophy of Art is, in our times, much more necessary than it ever was in those times when Art was sufficient in itself as Art."\*

That the German poets are critical poets, no one doubts ; and although doubts are expressed as to the genius of Gæthe and Schiller by some few, gifted with an appreciation of works whose language they do not understand, yet waving all comparisons, this one truth remains : they sufficed for their country and epoch ; they were the artistic expression of the time, and have had all the influence which poets can attain. This is something ; it is worth studying, even if Art be dead. It may be very plausible to talk about the "infancy of nations" being favorable to Art, and of civilization "by enlarging the understanding, thus weakening the influence of imagination," but we hold it to be altogether false and rhetorical. Was the age of Pericles, of Augustus, of Louis XIV., of Elizabeth and James, and of Europe after the French revolution,—was any of these the "infancy of nations ?" Were not all the intellectual faculties then in as vigorous play as now ? Were not science and philosophy equally at work ? What then becomes of the

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\* Æsthetik, b. i. 16.

argument about "infancy of nations?" Or, setting these aside, if Art be, as we believe, a social mission; if it be the expression of the age under its emotive and beautiful phases, will it not *vary* with the age? If it was "imaginative" then, may it not now receive another impress, and still affect its mission? All Ideas are not equally favorable to Art, though, when dominant, they must be equally expressed by it, as indeed they are not equally favorable to humanity. For instance, the dominant Idea of the eighteenth century (i. e. that portion which is known as the eighteenth by reason of its dominant Idea, for towards the close of it began the new era) was analysis, the most fatal of all to Art, inducing "scientific accuracy of statement," whereby it becomes didactic, and ever on the verge of prose; inducing, moreover, the great attention to details, to passages, cramp-versification, and "sober reasonableness." On the other hand, synthesis admits and demands that high mystic expression which feels more than it comprehends, and includes all particulars in the general; hence its intensity. What are the poetic names? In France, Voltaire, J. B. Rousseau, La Motte, Delille, etc. In England, Addison, Pope, and that school. In Germany, Hagedorn, Ramler, Gellert, etc. In Italy, Metastasio. Everywhere mediocrity, mere form and good sense; no high poetic worth, no intense passion, no gospel tidings are to be read there. It was not a poetic epoch: but how comes it, if our theory of the poetic Idea be false, that there was not in all this century one man who could redeem it? Man, they say, draws his inspiration from nature, from his own heart; if so, why did he remain uninspired during this century? Surely nature's face was as fresh, as varied, and as beautiful as ever; surely man's heart trembled with passions, his breast swelled with aspirations, and there was woman with her affections; why then did no singer arise and pour forth a strain, which we and all the world recognise as greatly poetic? Because, we repeat, *man draws his inspiration from Ideas*; those of the eighteenth century were not suited to a poetry different from the one they brought forth—clever, correct, material. Yet the century was great in science, because analysis is a great idea for science: hence it saw Newton, Bernouilli, Clairaut, Maclaurin, Napier, D'Alembert, Laplace, Euler, Lagrange, Humboldt, Herschel, Fourcroy, Galvani, Franklin, Lavoisier, Haüy; and these were great intelligences, and their work was great for humanity. At the same time, the poets who then wrote expressed the spirit of their age, and sufficed for it: that they do not suffice for ours, although detached sentiments, lines, and bits of nature still delight us, is sufficiently apparent.

This, then, being a critical, conscious age, its artists must be critical to fulfil its demands; and æsthetics we take to be one of the means of elevating it out of the "slough of despond;" although it must likewise be emancipated from "commerce," and be placed on its own high pedestal, with real priests at its altars and real faith in its worshippers;—so long as the "commerce of sweet sounds" is the jingling of guineas, little can be hoped for. But that æsthetics, however studied, is able to create artists, we do not for an instant imagine; it can but direct the

artistic genius. Æsthetics is the philosophy of Art, and "philosophy," says Solger, "can create nothing; it can only *understand*. It can neither create the religious inspiration nor the artistic genius; but it can detect and bring to light all that is contained therein."\* To create a new and commensurate Art is not in the power of æsthetics; that must come from the new birth of an era; there must be the inspiring Ideas; but as in all the secondary stages men are employed in developing the many phases of the Idea, æsthetics, when perfected, will necessarily direct their energies into the right channels.

And this leads us to the indisputable position of æsthetics: if it be of no assistance to the artist, (which we deny,) it will render intelligible Art as art, as well as all existing works; it will enable us fitly to judge of the relics of the past and the productions of the present, and it opens an inquiry in the psychological department of the very highest interest. For these then do we demand a consideration of the subject.

In France, although rapid strides have been taken, and some notable results elicited, it still remains in a fragmentary state. The works of Quatremère de Quincy, however, are equally admirable for their clearness and profundity; yet we believe he is the only systematic thinker who has yet published works of importance. St. Beuve, George Sand, and others evidence profound insight, but only in parts; a whole is still wanting. In Germany it is received as one of the branches of philosophy; has its professors, its treatises and systems, and every man, woman and child is more or less imbued with it. Lessing, Winckelman, Herder, Goethe, Schiller, Kant, (*Kritik der Urtheilskraft*), Schelling, Novalis, the Schlegels, Tieck, Jean Paul, Solger, Hegel, are among the great stars which illumine this atmosphere; but their separate endeavors are too comprehensive to be even mentioned here. Solger and Hegel may both be consulted for the historic portion. Lessing's works, though mostly polemical and directed against the French poetry, yet contain much that is true and admirable for all times; especially the "Laocoon," which was translated by Mr. Ross of Edinburgh, an inestimable book to English readers. Winckelman's works are much *spoken* of, unfortunately little read. The French translation of his "History of Art" is unfaithful, and no English translation we believe exists. Jean Paul's "Vorschule" does not pretend to be systematic, but it contains some charming writing, illustration and close argument. His remarks on wit and humor are well worthy of study. Solger we can recommend but to those who are content to view the matter in its abstract logical shape, unrelieved by applications and illustrations. The essays of Schiller, though rather repulsive at first, from their Kantian rigidity of form, yet contain important ideas, and occasionally go to the very depth of the subject.†

\* Solger, *Æsthetik*, p. 9.

† See in particular "Über das Pathetische;" "Über Naive, u. Sentimentalische Dichtung;" "Über das Erhabene;" and "Über den gebrauch des Gemeinen und Niedrigen in der Kunst;" the last-named was translated in the "Monthly Chronicle" for February, 1841.



But while all these works are more or less known and talked of in England, the masterly and comprehensive "Lectures" of Hegel remain without even the most vague and general notice. Professor Gans, in speaking of how widely Hegel's doctrines are spreading in France through Cousin, Michelet, Lerminier, and the St. Simonists, sarcastically says, "and the English buy his works—to put him in their libraries;"\* but we fear the Professor's sarcasm falls harmless, and that we do not even buy his works for our shelves. Nevertheless, if any man is worth knowing in the philosophical department, it is Hegel; and towards this knowledge we have no helps, the only slender account being the extremely flippant and shallow one in Menzel's "Deutsche Literatur."†

George Frederick William Hegel was born at Stuttgart on the 27th of August, 1770. In his eighteenth year he went to the university of Tübingen to carry out his theological and philosophical studies. He was here a fellow-student with Schelling, for whom he contracted a great esteem; and he always spoke of these days in after-life with great emotion, even when he had become the opponent of his former friend. It was a critical period: the ideas of the eighteenth century, —analysis, materialism, scepticism and dogmatism, on the one hand, and the Kantian revolution on the other;—these were the conflicting philosophies in which he had to struggle. He had also another struggle to make, not of the most metaphysical, though sometimes more puzzling, viz., the struggle for daily bread—not unknown to philosophers! And so our young speculator had to give up high thoughts of professorships and philosophies, and was content (hunger impelling) to accept the humble place of a tutor, first in Switzerland, then in Frankfort. Early in 1801 his father died, and he then moved to Jena, the seat of learning and philosophy, with the property left him (*mit einigen ererbten Vermögen*), which could not have been large, as we find him, besides working with Fichte and Schelling, in the office of private tutor of philosophy. It was here, in 1801, in the thirty-first year of his age, that he published his first work, "Differenz der Fichteschen und Schellingschen Philosophie," in which he sided with Schelling, whom he joined in the editing of the "Kritischen Journal der Philosophie." In the second volume of this Journal appeared his celebrated article *Glauben ü Wissen*, or the reflective philosophy of the subjective as seen in Kant, Jacobi and Fichte. At Jena also he enjoyed the society of Goethe and Schiller;

\* Vermischte Schriften, ii. 257.

† This book has been recently translated under the false title of a "History of German Literature." We must enter our protest against it, as we think it very calculated to do harm to the students of German literature, by giving them prejudicial, false and flippant views. We should say the book is worthless; for it neither gives information nor opinion worth attention. Menzel has a shallow, dashing assurance; a ready, often eloquent pen, and an imposing dogmatism, which delude people at first, but if subjected to any scrutiny, his poverty betrays itself. His hatred towards Goethe, Voss, Hegel, as well as all Berliners, is of itself sufficient to show how prejudiced are his opinions.

the former, with his usual sagacity, detecting the philosophical genius which lay as yet undeveloped in him, of which more may be read in the "Briefwechsel zwischen Gœthe u Schiller." Here also he published his "Phänomenologie des Geistes," and with it separated himself entirely from the Schelling philosophy, written, it is said, while the French artillery was roaring under the walls at the memorable battle of Jena, as Archimedes pursued his researches during the siege of Syracuse. From Jena he went to Bamberg, where for two years he edited the Bamberg newspaper! Conceive the *Times* edited by a philosopher! In the autumn of 1808 he was appointed Rector of the Gymnasium at Nürnberg. He here married; and his marriage, instead of impeding, only seemed to give fresh spur to his ambition. With his wife he lived for twenty years in the most perfect happiness, which only ended with her death. In 1812 he published his "Wissenschaft der Logik." By logic the Germans mean something far different from our "elements" or "arts." Hegel divides it into two parts: the *objective* logic, which, being partly the transcendental logic of Kant, is the substitute for the metaphysic of the ancients; and the *subjective* logic, or the forms of self-consciousness. This work made a great sensation, and he was soon after (in 1816) called to the chair at Heidelberg, where he lectured to crowds of admirers. In 1817 he published his "Encyclopädie der Philos. Wissenschaften," the great merit of which was its detailing all his ideas, and that too in a more intelligible form and language, than he had hitherto attempted. Here he made acquaintance with Victor Cousin, whose best ideas are taken or modified from Hegel. His reputation had now spread so far, and so many eyes were turned to him as the apostle of the new philosophy, which rank neither Fichte nor Schelling could properly attain, that he was called in 1818 to the chair of Berlin, which he accepted, in spite of the endeavors made by government to retain him. In Berlin he first found his proper sphere; and there, lecturing the first year with Solger, and the subsequent two years alone, he modified, developed and finished that philosophy, which is now considered as the final result of German thought. Logic, metaphysic, psychology, jurisprudence, history, religion, history of philosophy and æsthetics, these were the subjects which he chose as the various phases of his philosophy, and in the development of which he passed his life,—a wide range; and when we consider the depth and completeness with which he treated them, perfectly astounding. On the 24th of November (the anniversary of Leibnitz' death), 1831, in the sixty-first year of his age, he expired, after a short attack of cholera. "Hegel," says Professor Gans, and we think with truth, "has left many profound disciples and scholars, but no successor; for philosophy with him accomplished its circle (*hat ihren Kreislauf vollendet*); its progress is now only possible in the complete development of all that is contained in it, after his method."\*

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\* Vermischte Schriften, b. ii. p. 251. To this, to the "Biographie Universelle," and to the "Conversations Lexicon," we are indebted for the particulars of the above account.

Such were the life and works of Hegel; and whoever looks over the catalogue of his writings will marvel at the exceeding activity of a genius so profound. Nor is his acquaintance with Art, ancient and modern, as seen in his "Lectures on *Æsthetics*," less surprising. Accustomed as we are to the "division of labor" in our learning, and to find men dedicating themselves exclusively to one subject or one phase of it, we are astonished at the large universality of appreciation mixed up with this deep meditative spirit.

The "Lectures on *Æsthetics*," to which our attention is now specially directed, is, we conceive, of all others, that which would most readily be accepted by the English, both on account of its subject, and on account of the comparatively intelligible language in which it is communicated. In these speculations we are struck at the outset with the difference of procedure between the Germans and ourselves. They consider, that as Art is a production, a creation of the mind of man, the real way to set about its examination must be the investigation of those laws of the mind from whence it proceeds; thus they examine the germ to know the physiology of the flower; and thus it becomes itself a branch of psychology. *They* examine the producing mind; *we* the work produced. They inquire into its absolute, abstract state; we into its concrete, individual state. With them each work is but as the illustration of a principle; with us it is isolated. An *æsthetical* view of one drama should furnish the key to all dramas; with us each drama requires a separate examination. The laws, then, of *æsthetics*, when truly analysed and posited, are immutable; for they are not those of taste and fashion, but the eternal principles of the human mind. But here an obstacle presents itself: rightly to comprehend their *æsthetics*, you must also comprehend their psychology; and as with this the chances are small that Englishmen will agree, or even understand, a feeling of antagonism will be generated at the outset,—a feeling, however, which a little steady perseverance will soon overcome. We candidly admit that we neither *understand* every part of Hegel's "*Æsthetik*," nor do we agree generally with German philosophy; but that, nevertheless, Hegel is the most delightful, thought-inciting and instructive work on the subject we have yet met with, and that four years' constant study of it has only served the more to impress us with its depth and usefulness. This is said to encourage those whom it may at first repel; for, unlike the other works, it may be read without any agreement with its first principles; its detached remarks and criticisms, its scientific and elaborate arrangement of the subject, and its treatment of details, may all be received.

The very fact of all these laws being referable to the mind prevents any very great disagreement, since you have only to translate the principle into your own formula, and the thing becomes intelligible. Where you differ, it is mostly with the application of his philosophy to the matter, not on the matter itself.

The work opens with an introduction, in which the nature of *æsthetics* and its various theories are discussed. Then comes the first part,

*a priori* examination of the germ—the Idea. What is meant by this the idea (*Idee*) it is difficult to render intelligible in English. It may assist the student to observe, that the fundamental principle of the Hegelian philosophy is, that the Idea (*i. e.* the absolute—the *ens*) determines or manifests itself subjectively (or in the mind of man), as Reason—objectively (or externally), as the universe—the *non ego*. There are three epochs in the evolution of the Idea. I. It determines itself as quality, quantity, objectively, etc., *i. e.* Logic. II. It determines itself as the universe, and develops itself in nature. III. It determines itself as mind, cognizant of its prior states. In other words, the *Idee* is the totality of the universe both of mind and matter, in its unique conception; and this *Idee*, this Absolute, conceived under the form of thought, is truth; when conceived under the form of nature or of external phenomena, is Beauty. Thus Beauty is spirit contemplating the spiritual in an object. Art is the Absolute incarnate in the beautiful. The *germ* is in the first part examined: in the second part we have the particular *physiology*, the development of the ideal in its separate forms; such as the symbol, allegory, etc., (where the mysteries of oriental art are unfolded), the classical, ideal, and the romantic ideal. And, in the third part, the *flower* itself is examined; *i. e.* the fine arts in their respective existences, architecture, sculpture, painting, music and poetry; the separate laws of which are methodically unfolded and posited.

It will be obvious, that no further account of such a work is practicable in an article; for how condense a system? It is not a rambling three volumes prepared for the market, and containing a given number of ideas to a given quantity of twaddle, but the fruit, the condensed matter of years of rigorous investigation. Neither can such a work be known by extracts, the common mode of settling these difficulties. We have done our duty therefore, we conceive, in indicating the existence of the work, what it specially treats of, and in what spirit; to those whom it interests more were superfluous—they will study the original. We do not conceal from the reader that he will meet with many obstructions; difficulties of language (this work, however, is generally written in an intelligible, sometimes eloquent style) and of thought; differences of philosophy, and a tendency to what the English call “mysticism” (because they persist in not translating it into their forms of thought); but these obstructions are unimportant, and with courage are soon conquered. If a “light work” be required, if “pleasant critical chat” be wished for, let no one open Hegel; but if an earnest inquiring spirit wishes for the light of a vast and penetrative mind, and does not grudge a little patient study, then we would say—read Hegel. Let none touch it who are not in earnest; it is a sealed book to them, and they will only rise from its non-perusal to gabble about its “German mysticism.”

But although it is impossible for us here to give any complete or satisfactory insight into the contents of these “Lectures,” we may at least extract one or two of those detached criticisms with which, as we



said, they abound ; and we select the one on the Dutch painters, not because it is the most striking, or the most interesting, but because the tendency in England is to underrate these painters, misconceiving the spirit in which they worked.

"The Dutch chose the subjects of their pictures from themselves and from their contemporary and daily life ; and it ought not to be objected to them, that they thus again realized (*verwirklicht*) the present through art. What the present brought before the eye and mind, had a pregnant interest for them ; and to understand wherein lay this great national interest, we must question their history. The Hollander had, for the most part, *made* the country he lived in, and was continually struggling against the threatened inundations of that sea whence he had built it. The citizens and the peasants—the mass of the people, had through courage, perseverance, and endurance, thrown off the Spanish yoke of Philip II., son of Charles V., and then the most mighty ruler of Europe ; and, moreover, they had fought for, and won their political and religious liberty. It is this citizenship, and the spirit of enterprise in trifles as in great things, in their own country as well as abroad on the wide sea ; this careful and decent prosperity ; this joyousness and proud self-reliance, all owing to their own energy, which form the universal subject-matter of their paintings. This is no common vulgar subject-matter ; nor must we approach it with the elevated nose-in-the-air refinement of courts and politesse. It is a great nationality ; and in such vigorous nationality has Rembrandt painted his celebrated *Sentinel* at Amsterdam, Van Dyck, so many of his portraits, and Wouvermann, his *Troopers* ; and to this also belong those peasant festivities, jokes, drinkings, rows, boors, etc. In these pictures of marriages, dances, feasts, etc., even when they come to blows, there is always a free, joyous wantonness of spirit hovering over all, and women and girls are there, and the feeling of freedom and animal spirits (*ausgelassenheit*) penetrates the whole.

"The same with the admirable *Beggar Boys* of Murillo (in the Munich Gallery.) Considered externally, the subject is also one of low life ; the mother picks vermin from her boy, who sits quietly eating his bread. In a similar picture, two ragged dirty boys are eating melons and grapes ; but amidst this poverty and half-nakedness, their entire indifference, their absence of all care and sorrow, indicates their health and enjoyment. It is this indifference to the external, and this internal freedom, which raises them to the ideal. In Paris, there is a portrait of a boy by Raphael ; he leans his head idly on his arm, and looks forth on the wide world with such holy, quiet contentedness, that it is almost impossible to tear oneself away from this spiritual health and clearness. Murillo's Boys have the same air. One sees that they have no further interests or ambition ; and this is not from mere stupidity, but, happy and contented as the Olympian gods, they loll upon the ground with their luscious fruit ; they do nothing ; they say nothing ; but they are without sorrow, without restless discontent, and we see in them a clear picture of mankind in its brightest state ; and in this groundwork of all greatness (spiritual healthiness) we see that every thing could be developed from these youngsters. How different is the modern treatment of such subjects !"

From his masterly delineation of the ideal in *character*, we select the following passages :—

“The ideal demands in a character some peculiar passion which leads him on to determinate aims, resolves and actions. Should, however, this principle be carried too far, the result will be, instead of an individual an abstract form of passion, in which all vitality and subjectivity is lost, and the representation becomes, as it is often among the French, cold and uninteresting. In the particularity of a character, therefore, one side must appear as the dominant feature, as the centre round which the others play, so that the individual has space given him to develop himself in several situations, and the whole riches of his internal nature are brought into play. Such vitality, notwithstanding the unity and intensity of the dominant passion, is exhibited in the heroes of Sophocles. One may compare them to sculpture from their plastic comprehensiveness. We see in the genuine statues a quiet depth, which admits the possibility of realizing every power if once put into action; the dominant passion is depicted, but the other phases are also indicated. So Shakspeare's Romeo has love for the dominant passion; we see him, nevertheless, in manifold relations to his parents, kindred and friends, in contest with Tybalt, in reverence and confidence to the monk, and even on the verge of the grave in moral conversation with the apothecary from whom he buys the poison, and always noble and elevated by the depth of his emotions. Hence, the peculiarity (*Besonderheit*) of a character must accord and unite with the subjectivity; man must have a precise form, and in this precision (*Bestimmtheit*) the firmness and power of some dominant passion. If man is not thus in unity with himself; if this passion do not penetrate and be not supported by the other phases of his character, (*Ist der Mensch nicht in dieser Weise EINS in sich,*) then are all the manifold phases superfluous, lifeless, senseless. To be in unity with oneself, is that which constitutes the infinite and godlike in art. Thus it destroys the individual unity, when a character, which the power of some great passion elevates to the heroic, is allowed to be ordered or persuaded by an inferior person, or when the crime is rolled off its shoulders on to those of another; for instance, when *Phèdre*, in Racine, allows herself to be persuaded by *Ænone*. A genuine character acts from its own volition and persuasion, and admits of no foreign influence. But if it has acted from itself, then will it bear the consequences of its deed.”

We hold this last to be true as a rule, but question the illustration. *Phèdre* is not meant to be a great character, but a *weak woman*; and this weakness we take to be itself the dominant pathos of her character.

From these extracts the reader will see that Hegel is no pedantic professor, shut up in the classicalities and cant of criticism; although he does not recognise the Dutch and the Spanish painting to be the highest ideal, yet he sees how it fulfils its conditions, and that it is ideal. He sides also with the many against the few critics on the subject of *anachronisms*.

"A work of art," he says, "and its enjoyment, are not for the antiquary and critic alone, but for the public; and the critics need not carry matters with such a high hand, for they themselves belong to that public: and when honest, they must confess that correctness and severity in historical trifles can even for themselves possess no serious interest. It is from this feeling that the English only give such scenes from Shakspeare as are *in themselves* admirable and intelligible, because they do not share in the pedantry of our critics, who would fain drag before the public all those antiquated *externals* in which they cannot possibly interest themselves. Hence, when foreign dramas are put on our stage, the public has a right to demand a certain national revision and alteration to suit their taste. In this respect even the most excellent require revision."

This reproof points to one of the fundamental laws of æsthetics, viz., *the temporalities in art*; a subject wrapped up in the confusion of prejudice and ignorance, but which must be dragged out of its darkness and clearly discussed before any step can be taken in the judgment of the past; and it is owing to this law never having been developed and applied to the purposes of criticism, that so much folly has been written about the ancients and earlier poets. A most valuable and interesting essay might be written on the "Variation of Æsthetic Feeling in the different Epochs of Poetry," which would indeed be the application of the above law. For example, the treachery of Ulysses\* is to us most revolting; to the Athenian audience it was highly crafty, and commendable *as craft*;—it was æsthetic. So when Shakspeare makes the charming Celia fall in love with, and marry the repentant villain Oliver,† to an audience of his day, accustomed to the tone of romantic literature, wherein sudden conversions and love at first sight abounded, this was æsthetic, though to us most painful. We prefer Hector to Achilles; not so the Greeks. When Gœthe treated in *Iphigenie* the same subject as Euripides, he was forced to introduce new feelings and new ethics: the Greeks would have laughed at her scruples of *honor*; Christians would have shuddered at the Greek treachery. It is owing to the neglect of this branch of inquiry that such utterly false criticisms are written on Calderon; critics mistake the Catholic element he breathed, the Catholic audience he addressed. Such an essay should contain potentially the whole history of poetry; and it is from the want of it that no history of poetry yet written is really critical. To write such a history, a man must, as Schlegel says, "possess an universality of mind; a flexibility, which, throwing aside all personal predilections and blind habits, enables him to transport himself into the peculiarities of other ages and nations, and *feel them, as it were, from their central point.*"‡

We have now performed our task of introducing Hegel and German

\* Sophoc. Philoctetes.

† "As you like it."

‡ Dramatic Literature, vol. i. p. 3.

æsthetics to our readers ; more we could not do—more we did not attempt ; to such as are interested in the subject we hope it will be sufficient.

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### ARTICLE III.

#### EDUCATIONAL AND ECCLESIASTICAL CONDITION OF SCOTLAND.

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THE general character of the people of Scotland is well known. The physical features of the country are a fit emblem of the robust and unyielding spirit of the population: No community in Europe has presented a more determined front to every kind of foreign influence, especially such as has threatened to soften the characteristic sternness of national manners, or mitigate the rigor of Calvinism. In every department of study and of action this strong peculiarity has showed itself. We find ample proofs on the battle-field, and in the halls of science. The General Assembly alone furnishes evidence of the truth ; for it will sooner incur the hazard of driving from her ranks a large body of her ablest champions, and also of her devout sons and daughters, than yield one iota of that which, in her opinion, makes the kirk the glory of all lands,—the most illustrious of ecclesiastical institutions. All the ports of the country are next to closed against novelties, in respect of morals and manners ; and while the poor Irish in tens of thousands are advancing in temperance reformation, the Scotch much more stiffly adhere to their former habits, hating innovation whether in the shape of new-fangled notions, or extraneous lights. We have heard them described as men of sturdiness to mingle strong drink, equally as they are to construct systems of mental philosophy.

When right or when wrong, there is something about the Scotch people that commands respect ; for they present a distinct and permanent national character, which is as often perhaps, illustrated on the one side as on the other. Many, too, are the associations which find a welcome in the heart of the stranger, belonging to the land of the mountain and flood. And beyond this, great and glorious are the achievements which sustain the name of Caledonia. Need we allude (keeping more especially within the sphere indicated by the running title of our paper) to the hero-reformer, the Rutherfords, the Erskines, the Gillespies—to two of the triumvirate of British historians—to the never-dying names in intellectual science—or to the sons of song ?

Let us for a few seconds inquire what are the principal causes of the



marked and prominent peculiarities of the Scottish character. To what are we to attribute the boldness, the intelligence, the reputation for stern virtue and moral power, which have for centuries distinguished the inhabitants of North Britain?

In the first place, the climate and physical condition of the country must have exerted an important influence. Scotchmen, if they should live at the sources of the Indus, would be Affghans; if in the fastnesses of large regions of Arabia, they would sleep under the black tent, or waylay the luckless traveller; or if on the mountains and the borders of the lakes of New England, they would be independent Christian yeomanry. Mountains and floods, mists, roaring torrents, silver *lochs*, rugged precipices, not only require from those who inhabit the regions where these features predominate, such activity and energy as discipline the mind to a corresponding character, but the very sight and sound of such physical elements naturally exercise a great power over the intellectual and moral qualities. The sublime, the beautiful, and the touching, which are inseparable from the phenomena alluded to, reach the hearts and the minds of all who are their daily witnesses. Even Dr. Johnson, phlegmatic as he was, and a cordial hater of Scotchmen, revealed something like the national sentiment of which we speak, when he journeyed to the home of St. Columba. This influence of external objects is not inconsiderable at any time or in any circumstances. "The Arab, in his boundless desert of sand, is linked in affection to the few and the burning objects with which he every day meets. The dazzling column of sand reminds him of his dear birth-place, and of the long succession of Sheikhs, who have come in and gone out before his tribe. How much greater must be the effect of natural objects in a northern and mountainous region, especially if these objects be associated with stirring events in the national history! Here was the glen that sheltered William Wallace from his foes. There stood a hut in which the outlawed Bruce found an asylum. Deep in that cavern, where the crystal water bubbles up, the Covenanter's infant was baptized, and on that little knoll the aged elder was gathered, not to his fathers, but to his final rest. In that narrow vault, how often has the death of Jesus been remembered, when his disciples met in trembling and fear, or in joyful thanksgiving over some great deliverance!"

Secondly, the fierce political and ecclesiastical contests which marked the history of Scotland from the era of the Reformation, up to the accession of James the Sixth to the throne of the United Kingdom, and even during the sway of the whole of the latter Stuarts, operated powerfully towards the formation of the Scottish character. The country was, almost without intermission, the scene of the wildest anarchy, or the most grinding oppression. The blood of kings, nobles, and peasants, flowed for ages like water. The clan had an Indian's thirst and scent for its neighbor. Indeed the civil history of no nation in Europe, till within a century or two, is less grateful to the philanthropist than that of *auld* Scotland. William Wallace perished on the scaffold, a victim of domestic perfidy, as well as of foreign fear and hate. James the

First, an accomplished prince, was murdered by his nobles. The insufferable tyranny of the Third James excited a rebellion, in which he was vanquished and slain. The next of the name fell at Flodden, with the flower of the nation. The hostility of his grand-daughter to the prevailing religious sentiments of her people, was the cause of discontents and distractions, which terminated in rebellion, her flight to England, and her execution. The union of the two crowns was not the harbinger nor the solderer of peace. Even after the Revolution in 1688, yea, and the union of the monarchies in 1707, national jealousies and rivalries, desperate intrigue and formidable invasion shook the island. The partizans of the Stuart dynasty twice rose against the house of Hanover. And mark, in these political enmities and commotions, the ecclesiastical fortunes of the people were closely interwoven ; or rather, the affairs of government were often identical with those of the church. These stirring events, this unceasing excitement, could not but operate directly upon the character of an otherwise strong-hearted and stubborn people. The Scotchman was reared in storms both physically and morally. His life was a hard discipline. The sturdier elements of his nature were necessarily brought into active play. The tempestuous passions found full scope. Rigid prejudices were fed. He sought for conflicts, and feats of daring became a great object of his existence. To murder a noble, or to break a sceptre, was a familiar thing. The butcheries of the battles fought in Scotland, attest the physical courage and the relentless temper of the combatants. And neither have the remembrance nor the sentiment of these days wholly perished, although manifested in other fields and on other occasions. The same stern spirit of which we speak displays itself in the gladiatorship of opinion. A passion for wrangling and a dogged tenaciousness in argument may be instanced ; so that the accusation does not appear to be unfounded, which says that the Scotch manifest an inability, certainly an unwillingness, to distinguish between the substance and the shadow, in spite of all their acuteness. Not even do the weapons in the warfares which they wage exhibit the polish which is so easily obtained. In the famous dispute, for example, respecting the circulation of the Apocryphal Scriptures on the part of the British and Foreign Bible Society, the people of Scotland, almost to a man, rose and cut off all connexion with their southern fellow-Christians. It must be added that they came off victorious in so far as the principle was contested, whatever may have been the injury done to the common cause : a point upon which we offer no opinion. The doings of almost every General Assembly demonstrate, that the present generation are made of the like " stuff" with their ancestors.

In the third place, Scotland is largely indebted not only for her intellectual and literary, but for her ecclesiastical condition, to the early and general establishment of parochial schools.

In early times the monasteries contained the only seminaries of education then known in Scotland. If any schools existed in the larger burghs, they were under the patronage of religious houses. Long prior to the

Reformation, there seem to have been such seminaries, where Latin was taught. After the Reformation, the establishment and maintenance of schools became an object of constant and anxious consideration on the part of the clergy. In the first book of discipline, composed in 1560, it was recommended, that every parish where there was a town of any reputation, should have a schoolmaster "able to teach the grammar and Latin tongue;" and that "in landward parishes, the minister should take care of the youth of the parish to instruct them in the rudiments, particularly in the catechism of Geneva." Our readers will bear in mind the nature of the words upon which we have laid emphasis. The fact is, the church never lost sight of the object which these words point to. Many acts of the General Assembly were passed in relation to it. When applying for the restitution of church property, the endowment of schools was never forgotten by the ecclesiastical courts. In 1616, the Privy Council for the first time interposed its authority, and enacted that in "every parish of this kingdom, where convenient means may be had for entertaining a school, a school shall be established, and a fit person shall be appointed to teach the same, upon the expense of the parishioners, according to the quantity and quality of the parish." Episcopacy then prevailed; and this act was directed to be carried into effect, "at the sight and by the advice of the bishop of the diocese in his visitations." In 1633, the act of council was ratified in Parliament. This was the first legislative enactment authorizing the establishment and endowment of parish schools.

During the civil wars a more enlightened act was passed, which, though rescinded at the Restoration, was adopted almost *verbatim*, in the celebrated statute of William and Mary, in the year 1696, which is the foundation of the present parochial system. The statute is as follows: The estates of Parliament, "considering how prejudicial the want of schools in many congregations hath been, and how beneficial the providing thereof will be to the kirk and kingdom, do, therefore, statute and ordain that there be a school founded, and a schoolmaster appointed, in every parish not already provided, by advice of the presbyteries; and that to this purpose the heritors (landholders) do, in every congregation, meet among themselves, and provide a commodious house for a school, and *modify* a stipend to the schoolmaster, which shall not be under 100 merks (£5, 11s, 1½d.), nor above 200 merks, to be paid yearly at two terms," &c. In the year 1693, an act had been passed, entitled, "An Act for settling the Quiet and Peace of the Church," which declared, among other things, "that all schoolmasters and teachers of youth in schools are, and shall be, liable to the trial, judgment and censure of the presbyteries of the bounds, for their sufficiency, qualifications, and deportment in the said office." The whole system was arranged and completed by another act of the Parliament of Scotland, in 1699.

The object of these various acts of the government was happily attained. For more than a century after the enactments, the great body of the people of Scotland were better educated than in any other division of Christendom. The power to read and write, and an acquaintance

with the elements of arithmetic, were placed within the reach of almost any individual ; while all classes of the people were enabled to peruse the Bible from their earliest years, and, with the assistance of the catechism, which was regularly taught in every school, to receive the rudiments of a religious education, such as they could not have in any other country of Europe.

During a large part of the last century, the schoolmasters, in many parishes, were qualified to give instruction in the Latin language to such as were desirous to acquire a grammar-school education. A very considerable number of individuals throughout the kingdom, have been prepared for the Universities, in the schools of the parishes they were born in. In 1836, there were 916 separate parishes in Scotland, and the total number of schools was 1162, there being 146 endowed schools over and above one school for each parish. (Of course there are as many private ones as individuals may think it proper to open.) Taking the average income of the 1162 schools at £27 10s., which is about the sum, the annual endowment amounts to £31,955, exclusive of school-houses, dwelling-houses for the teachers, and a garden. The ministers of parishes and the heritors have the power of determining the branches which a schoolmaster, on induction, must be competent to teach. These must therefore vary considerably in different parishes. In burghs and the larger towns there will be found schools for the study of the classics alone, or with French. Most of the teachers have received a university education. In the three northern counties of Aberdeen, Banff, and Moray, according to a report presented in 1835, out of 137 teachers, there were only 20 who had not studied at college. The law makes no provision for the payment of assistant teachers.

The decision of the presbytery is final in all matters relating to schoolmasters as such ; unless when a civil question arises, which may be carried by the teacher before the courts of law, just as any other member of the community can do. All parochial schoolmasters must be members of the established church, and are required, on induction, to subscribe the Confession of Faith and the standards. Every Presbytery is understood, by means of a deputation of its members, to visit and examine the various schools within its limits once every year. This, however, is not uniformly done. The heritors and minister have the right of fixing the fees which the scholars are required to pay to the teacher. These fees are generally very low. The annual income, from salary and fees, may be about £50, exclusive of a house and garden. In the majority of the parishes, however, the schoolmasters have slight additional emoluments arising from being clerks to the kirk-session, and in some instances precentors. They have also small perquisites for making up militia lists, &c.

Great advantages must flow from such a system of education. The character for intelligence which the native of Scotland has long borne throughout the world may be traced, in no inconsiderable degree, to the parish school of his birthplace. This common school education has raised the private soldier in many instances above his English and



Irish comrades. A part of the men who conquered under Wellington in the Peninsula and at Waterloo, were trained under the conjoint influence of the kirk and the school. The British lines were not a mere aggregation of brute force. It was intelligence, and, in some degree, moral principle, which made their onset so often irresistible. The benefits of this general education may be seen in softening the rigidity of the Scottish character, in polishing its rough points, and in imparting some show of reason even where physical obstinacy was the predominating element. These benefits may also be tested in this way,—the few millions that inhabit North Britain enjoy a reputation, and exert an influence, to which double the number of the population of any other part of the empire cannot make a pretension. A main ground of this difference is the early education in the one case, and the want of it in the other. What a blessing beyond all computation would it have been to Ireland, if a parochial school system had been, for two centuries, in active and untroubled operation within her bounds!

The system, however, was found, at an early period, insufficient to meet the wants of the Scotch. The grand object of the Society for Propagating Christian Knowledge, as described in the patent in 1709, was, and it still is, "the increase of piety and virtue within Scotland, especially in the Highlands, islands, and remote corners thereof, where error, idolatry, superstition, and ignorance do most abound, by reason of the largeness of the parishes, and the scarcity of schools." The Society has accumulated a capital of about £100,000. Of the 340 functionaries of the Society, all are stationed in the Highlands and islands, with a few exceptions of teachers and a missionary. When the Society was instituted, neither the Bible, nor any religious book, had been translated into the Gaëlic language. This great deficiency is now no longer to be complained of.

But notwithstanding the labors of this Society, much ignorance still remained. In 1824, a committee of the General Assembly discovered, that in the north-west parts of Scotland, there were not fewer than 10,500 children, under fifteen years of age, destitute of the means of education, and that not less than 250 additional schools were necessary; and they have since ascertained, that the total number of persons of both sexes, of six years and upwards, in all the parishes of the Highlands and islands, unable to read either in the English or Gaëlic language, amounts to 83,397. (Our Southern readers must take into account the poverty and scantiness of the people, the mountainous character of the region, and the numerous difficulties interposed by rivers, lakes, creeks, and seas, to the ready access to schools; not to speak of the many miles that must often have to be trod in inclement weather to the nearest establishment of the kind, even supposing that the road is level and straight.) The Rev. Dr. Gordon stated at the meeting of the General Assembly in 1840, that there were 90,000 persons in Scotland who were unable to read; and a great portion of these are to be found in Glasgow and Edinburgh, the receptacles of many of the most destitute from all parts of the country, and of the lowest of the Irish. Exer-

tions, however, are being used to lessen and to check the ignorance and immorality attendant upon such a condition of things ; advantage having been taken of certain government grants with a clause to this effect, introduced by the Assembly,—that nothing shall be done by the government inspectors, prejudicial to the interests of the established church.

The Secession church has, like the Establishment, shown an interest in the cause of education. The number of schools, owing their origin to this church, exceeds 100. They are established, on a large scale, in the great cities, and form models of good tuition. The number of Sunday schools in Scotland is about 600, two-thirds of which, it is believed, belong to Dissenters. The whole number of schools in Scotland may be estimated at 4,600, of which 3,000 are private or voluntary. It is supposed that about one-ninth part of the population are at present in the process of education.

There is a species of school established within the last thirty-five years, called Academies, in the larger cities. They are under the direct care, either of the subscribers by whom they have been founded, or of the magistrates. These academies, and the ancient burgh schools, such as the High School of Edinburgh, are regarded as the best seminaries in Scotland, embracing all the necessary and ornamental branches of education, each branch taught by a separate master.

Any account of the state of education in Scotland, in order to afford grounds for forming an estimate of its influence upon the national character, would be very incomplete, without some notice of the universities. These universities are not now of an ecclesiastical character, or, in the ordinary acceptation of the term, ecclesiastical bodies. They are connected, indeed, with the established church of Scotland, the standards of which the professors are required to acknowledge, though this is now, often, practically set aside. Like other seminaries of education, they may be subjected to the inspection of the church in relation to any religious opinions which are taught in them. The professors of divinity, whose instructions are intended for those connected with the established church, are, in their character of Professors, members of the presbytery of the bounds ; and each university returns a representative to the General Assembly. But in other respects these universities are not ecclesiastical institutions, not being more connected with the church than with law or medicine. They are intended for the general education of the country, or whoever resorts to them. Not a few of the dissenting ministers of England have been educated at the Scottish universities. All the classes may be taught by laymen, with the exception of those of divinity ; and in no part of the system, except in theology, is any distinction observed with reference to the views or pursuits of those intended for the church. It is also very important to observe, that they have, in no respect, been framed or modified with reference to the means, or pursuits, or habits of the aristocracy. The system is that of a general plan of education, by which persons of all ranks may be equally benefited. It is the peculiar and beneficent character of the

Scottish universities, that they are intended to place the means of the highest education in science and philosophy within the reach of persons in humble ranks of life, while, at the same time, they are equally fitted to educate and enlighten the youth of the highest class in society. The Scottish universities have always embraced students of every variety and description. Men advanced in life, who attend some of the classes for amusement, or in order to recall the studies of early years, or to improve themselves in professional education, originally interrupted; or persons engaged in the actual occupations of business, who expect to derive aid in their pursuits from the new applications of science to the arts; or young men not intended for any of the learned professions, or meaning to go through any regular course of university education, but sent for one or two years to college, in order to carry their education farther than they could prosecute in the parochial schools, before they engage in the pursuits of trade or commerce. The system of instruction by a course of elaborate lectures on the different branches of science and philosophy, continued daily for a period of six months, is admirably calculated to answer all the objects which such persons may have in view, as well as to afford much useful instruction to regular students.

The remuneration of the Professors depends, in the larger universities, mainly, and in Edinburgh, it may be said, entirely, upon the fees paid by the students. From the fact that the reputation of the professors must be greatly increased by the number of persons attending upon them, especially those who have just been alluded to, there is danger, that in proportion to the increase of auditors, the important and primary object of the regular education of youth may be overlooked, of examinations and exercises gradually giving way to lecturing alone. In practice, however, there is a separate hour appointed for these essential means, in many of the classes, so that the lecture is not interrupted; neither is the process of examination nor the opportunity of reading and criticising exercises lost. The students in the Scotch universities do not reside within the walls of the college, or in any place subject to the inspection of the university authorities. They reside wherever they choose, or find it convenient; and after they leave the class-room, their studies and occupations are not necessarily under the eye of the professors. In Edinburgh and Glasgow, it may be safely said, that the professors do not generally know much more of the students, (except when in their class-rooms, than of the other youths of these great cities.

There are no endowments or establishments connected with the Scotch universities, such as fellowships for the maintenance of literary men, after their own education is finished, and who do not necessarily take any share in the business of instruction. There is no encouragement, therefore, to prosecute, to any great extent, those branches of literature which do not directly tend to useful objects in life. Without the strongest natural inclination, it is in vain to hope that many persons will devote themselves to classical literature as their peculiar

pursuit, with the zeal exhibited in other countries, when they cannot thereby attain any immediate honor or future advantage.

The medical department of education in the universities of Scotland has obtained the utmost attention. During a long period, a great proportion of the persons who have practised medicine throughout the British empire, and who have occupied the medical stations in the army and navy, have been educated for their profession in one or other of these universities. The medical school of Edinburgh has long possessed high celebrity, and that of Glasgow has, of late years, risen into great eminence; and there is reason to believe that this branch of academical instruction may soon reach an important rank in the university of Aberdeen. Much less attention has been paid to the study of the law. A full course has not been established at either of the universities, unless that at Edinburgh be an exception,—the seat of the supreme courts, and where the Advocates are bred. The session for the study of Divinity in the university of Aberdeen is three months; in St. Andrews, four; in Edinburgh, though nominally longer, it is not so practically; while in Glasgow it is six months. Divinity is studied almost exclusively by persons intending to become ministers of the established church; and the General Assembly has, by various acts, prescribed the course of study, and the period of attendance at the divinity-hall, which shall be sufficient to qualify candidates for obtaining a license to preach the gospel, as the means of entitling them to hold parochial livings:

The oldest of the universities is that of St. Andrews, which was founded in 1410, by Bishop Henry Wardlaw, and confirmed by a papal bull in 1411. The college of St. Salvator was erected in 1456; that of St. Leonard in 1512; and that of St. Mary in 1537; the first two were united by parliamentary statute in 1747. In the united college there is a principal and eight professors; in St. Mary's, a principal and three professors. In the three colleges there are twenty-nine charitable foundations, called *bursaries*, of the aggregate value of about £1,100 per annum, whose benefits are extended to ninety-two individuals. The university of Glasgow was founded in 1571, by a papal bull, and its privileges were subsequently confirmed and extended by royal charters and parliamentary statutes. The discipline is administered by a court, consisting of the rector, the principal, and the twenty-one professors. The common business of the college is managed by the principal and thirteen professors. The number of charitable foundations is twenty-nine, of the annual average value of £1,165, and extended to sixty-five students. The principal and members possess the right of nominating ten students, members of the church of England, to exhibitions in Baliol College, Oxford University and King's College. Aberdeen was founded by Bishop William Elphinstone. A papal bull was issued for its erection in 1495. The affairs of the college are conducted, and its discipline administered, by a *Senatus*, which consists of the principal and nine professors. The fees, in the complete course of instruction, in the faculty of arts, do not exceed £20. The charitable foundations



are thirty-two, of the value of £1,771 per annum, and extended to one hundred and thirty-four students. Marischal College and University of Aberdeen was founded by George, fifth Earl of Marischal, in 1593, and in the same year not only received the sanction of the General Assembly, but was ratified by Parliament. The number of bursaries is one hundred and fifteen, of the aggregate value of about £1,160 annually; about sixty-seven are open to public competition. The whole number of professors is thirteen. The university of Edinburgh was founded in 1582, by James the Sixth. There is no chancellor nor rector. The number of professors is thirty-two. Bursaries thirty-four, of the value of £1,172 per annum, and extended to eighty students. The whole number of students, at all the Scotch universities in 1837, was above 3,400, of whom Edinburgh had 1,580; of the remaining, Glasgow had above two-thirds. Edinburgh, in 1822-3, had 2,234 students. The number has been gradually diminishing since that time. In 1835-6, they were thus distributed: law 217, divinity 173, medicine 679, arts and literature 511.

In the fourth place, the Scottish character has been strongly affected by the polity of the kirk, and by the vicissitudes which have marked the ecclesiastical history of the land since the Reformation. We take a rapid glance of the subject.

The Reformation began at an early period in Scotland, but made little progress till the time of John Knox, who was born in 1505. He was at first a zealous Romanist, but about 1544, he renounced Popery and became an equally zealous reformer. Soon after the accession of Mary, he retired to Geneva, where he remained till 1555, and where he became acquainted with the doctrines and polity of Calvin. In 1560 Popery was abolished in Scotland, and the Protestant religion established by act of Parliament. The system of ecclesiastical polity introduced, was embodied in a work entitled, "The First Book of Discipline, or the Policy and the Discipline of the Church." It was laid before parliament in 1560, as a necessary accompaniment to the legal constitution of the national reformed church; but though not formally ratified by the legislature, it was subscribed by many of its members. It was approved in the same year by the General Assembly. Though the parliament did not ratify the first book of discipline, it accepted and confirmed the confession of faith drawn up by the Protestant ministers, the object of which was to abjure Popery; and hence it was called the *negative* confession. Another confession or national covenant was subscribed in 1580-1, and on subsequent occasions. In 1581 the Assembly first divided the country into presbyteries and synods. Three years afterwards Episcopacy was established by act of parliament, and the Presbyterian ministers were persecuted and banished. In 1592 the Presbyterian form of government was restored, and it received, for the first time, the sanction of parliament, as the authorized government of the established national church. Manse (parsonage-houses) and glebes were provided for the ministers. From 1606 to 1638 Episcopacy again prevailed. In 1640 the Presbyterian government received the

sanction of Charles the First, and of his parliament. At the Restoration in 1660 Episcopacy again attained the ascendancy, which it with difficulty maintained, and at the expense of much persecution and martyrdom, till the Revolution in 1688; soon after which it was abolished, and the national church of Scotland declared Presbyterian; a form which it has ever since maintained.

During the whole period from 1690 to 1712, the most important deliberations in the General Assembly turned on subjects of internal regulation. In the last-mentioned year lay patronage was revived, or the right of nomination to a vacant parish by a lay patron. From 1690 to 1712, it was abolished, and the right of presentation was lodged in the landholders of the parishes, and the members of kirk-sessions. But in the last mentioned year patronage was revived, and continued the law of the church till 1834. After a presentation had been sustained by the presbytery, the presentee was appointed to preach in the vacant church for one or more Sabbaths; and a day was fixed posterior to his preaching, on which a *call* was to be extended to him by the people to be their future minister. At one period, the call was essential to a presentation; but its efficacy was gradually given up, till at length, without any alteration being made in the law, it virtually fell into desuetude, that is, a presentation was reckoned valid if a single name, or perhaps not a single name, was attached to it.

We shall not trace, even by the most rapid outline, the history of the enactments concerning the kirk, on the part of the Assembly, from 1712 to 1834. Suffice it to say that the right of lay patronage, and the offensive manner in which it was sometimes (many will say often) exerted and put forward, continually afforded matter for more or less discontent, and now and then was the occasion of riots. The opposition which several ministers offered to the settlement of a presentee, and for otherwise acting contrary to the views of the majority of the Assembly, subjected them to a rebuke at the bar; and ere long these ministers, constituting themselves into a presbytery, renounced all subjection to the judicatories of the church. Soon after, on the 15th of May, 1740, eight were deposed by the General Assembly, and their parishes declared vacant. To these ministers the name of *Seceders* was given; and as most of their congregations adhered to them, and others followed, they became the foundation of the Secession church of Scotland.

The secession of a portion of the established church was attended with important consequences. When the patrons of parishes began to exercise their rights more frequently, and with less attention to the wishes of the people, and when the people saw that they had a ready access to ministers of their own selection in the seceding churches, the opposition to presentees became more inveterate and unmanageable, and it was soon very difficult for the church courts to decide between the patrons and the people. Both parties, the moderate and the popular, who now began to divide the church, admitted the constitutional necessity of a *call* from a parish, to become the foundation of a pastoral

relation between the presentee and his parishioners. But the moderate party affirmed the legal call to be limited to landholders and elders, while the other party contended, as the original seceders had done, for the right of parishioners at large, or at least of the heads of families, to be admitted as callers. The former had the support of the government; the latter derived their strength from popular favor, and from the influence of those who deprecated every measure which they thought calculated to lessen the usefulness of the parochial ministers: in a word, these constituted the evangelical or puritan party.

Coming down to the present century, we may name the late Rev. Dr. Andrew Thompson as the great champion of the popular section; for he not only lent all his strength to stem the violent intrusion of clergymen, but aroused the people, by his eloquence and his practical efforts, to make a stand against what he considered an enormity as well as an anomaly in the Presbyterian church. He had able and zealous coadjutors; and since his death, some of the most popular and eminent men in the establishment have trodden in his steps.

At length, there having been a number of distasteful intrusions, and the dissatisfaction becoming general, a statute was passed by the General Assembly, which is known by the name of the *Veto Act*. This was enacted in 1834. "If," to quote the words of the act, "at the *moderating*, in a call to a vacant pastoral office, the major parts of the male heads of families, members of the vacant congregation, and in full communion with the church, should disapprove of the person in whose favor the call is proposed to be *moderated in*, such disapproval shall be reckoned sufficient ground for the presbytery rejecting such person, and he shall be rejected accordingly." The act further declares, that no person shall be held to be entitled to disapprove as aforesaid, who shall refuse, if required, solemnly to declare, in presence of the presbytery, that he is actuated by no factious or malicious motive, but solely by a conscientious regard to the spiritual interest of himself or the congregation.

Difficulties, however, soon occurred under the Veto enactment. In the case of one particular presentee, where the principles of the act were applied by the presbytery, the Court of Session, the highest civil tribunal in Scotland, which had been appealed to, declared the Veto Act to be incompetent and illegal, as incompatible with the full exercise of the right of patronage; and the House of Lords affirmed the judgment. In the very same month, the General Assembly determined, by a majority of forty-nine, to adhere to the Veto Act, notwithstanding the decision of the Lords; and out of the conflicting decisions between the civil and the ecclesiastical courts, and the encroachments alleged on each side to be made on its authority and jurisdiction by the other, extreme and next to unintelligible confusion has arisen. Presbyteries and individual ministers, presentees and patrons, have got themselves entangled in the web of difficulties; and on several occasions the censures of the courts have been pronounced, expenses levied, and other serious measures adopted to vindicate the alleged right of the tribunals,

the Assembly undoing that which the civil courts have ordered, and *vice versa*. We do not go into the history of these perplexities. What we have said indicates how distracted the kirk is at this moment; the majority of its members resisting every attempt which makes inroads upon the principle of non-intrusion; while the minority, the successors of the old moderate party, struggle manfully to preserve the law and the practices which characterized the ecclesiastical establishment of Scotland in the palmy days of lay patronage.

The number of ministers belonging to the establishment is 1,190; synods, 16; presbyteries, 80. These presbyteries send 218 ministers and 94 elders as delegates to the General Assembly. The city of Edinburgh sends two elders; 65 other royal burghs, 65; 5 universities, each one minister or one elder; churches in India, a minister and an elder; total, about 220 ministers, and 167 elders. The number of churches in the establishment is probably between 1,100 and 1,200. It has been estimated that the number of dissenters in Scotland, of all denominations, may be about 520,000. The whole population is reckoned at above 2,600,000.

The United Secession Church, the original Burger Association Synod, and the Relief Synod, were the most important of the Scotch dissenters. But in 1806, a number of individuals separated from the Burger denomination, in consequence of opinions held by the latter respecting the total independence and incompatibility of the civil and religious authorities. They termed themselves the Associate Synod of Original Seceders. They are in favor of a national church. In 1839 they voted, 39 to 13, to annex themselves to the church of Scotland. The reunion had been approved by a majority of the Presbyterians of the national church. The Reformed Presbyterian Synod represent the Covenanters of the time of Charles the First. They are the most rigid Presbyterians in Scotland.

The number of independent churches in connexion with the Congregational Union of Scotland is 98; ministers, 84. The Scotch Episcopal Church has six dioceses, between 70 and 80 chapels, with about the same number of clergymen. It is supposed that the whole Romish population of Scotland amounts to 140,000, including the children of Catholic parents. The Catholics, in Glasgow alone, amount to 35,000; in Edinburgh, to 12,000. They have three dioceses, 60 places of worship, and 74 pastors, counting bishops and priests. There are besides, various small sects in Scotland, as Baptists, Methodists, Unitarians, &c.

From the statements we have made, it is obvious that the Scottish national church is in circumstances of no little peril. In the language of Dr. Chalmers, "the ark is now in the midst of conflicting billows." One of the greatest difficulties is, that the civil questions, in the last resort, must be decided in English courts. Englishmen will not, or cannot understand the great points in dispute. To use the characteristic words of the leader of the popular party,—“The thing of immediate practical importance for us to observe, is the utter hopelessness of



inoculating therewith the mind of parliament, where, perhaps, there are not ten, in both houses, who could state, and there are not three who could vindicate, the great principle for which we are contending." And yet it is a question of the gravest import. It is a conflict of the government and the church. The poor presbyter is between two fires. If he disobey the Court of Session, he may find his next lodging-place to be the county jail; if he should contravene the command of the Assembly, he is degraded from his ministerial functions, and it is intimated that his parish is vacant. When two jurisdictions are conflicting, which must be obeyed? The difficulty is not lessened by the zealous efforts which are made to mix up the question with political appeals. Thus it is represented, that the Veto Act of 1834, was passed through the influence of the Edinburgh Whigs, and that it was the legitimate progeny of the reform mania of 1833. The English Tory party are earnestly called upon to come and assist the intelligence and property of Scotland in the contest with revolutionary violence and religious fanaticism, in which the North Britons are now engaged.

It is manifest, furthermore, that the principle of establishments is in imminent hazard. No man has recently done more than Dr. Chalmers to uphold national churches, and many are of opinion no man is now doing more to pull them down. The great object of the popular party seems to be, to abolish patronage altogether, and to rest the right of presentation in the voters, in the communicants, or in the landholders, or in these classes jointly. But the right of patronage is private property. Will it be given up peaceably, and without compensation? Will the state continue to support a church which thus trifles with private property, and with those very means which government possesses for extending the influence of the church of Scotland, and which that church has called on it to employ, and which it has employed? Many think that the Veto Act was the first step towards a separation of the church from the state altogether. The abolition of patronage will be another great step.

The interests of vital piety in Scotland, must necessarily languish, while Synods, Assemblies, and Commissions, are holding stormy debates, and while the great mass of the people are looking for deliverance from a civil court, or from a parliament.

Before closing our paper we revert for a moment to the educational branch of the subject. An opinion is entertained by not a few that a new order of preparation is required for the Scotch ministry. The law on the subject is well enough. A regular attendance at the divinity-hall for four sessions is demanded, as a course of study for the church; but this is very often completely nullified by the recognising, on the part of the Assembly, of what is termed irregular attendance, and which in fact is no attendance at all. Students of divinity who merely enrol their names in the books of the different professors, for six years, and who deliver a certain number of discourses specified in the rules laid down by the General Assembly, though they never hear a lecture, or receive theological instruction in any university, were held, till very

recently, to be equally qualified with the regular students for being taken on trials for a license to preach. Some modification has taken place, but it does not effect any substantial change.

Again, the acts of the Assembly enjoin that every person, entering upon trials, shall be examined as to his knowledge of the Hebrew language; but they do not require that the Hebrew class should be attended; and, in point of fact, a large proportion of those who become ministers never have attended it. In teaching Hebrew, the professor of Oriental languages at the University of Edinburgh states, that he does not use the points, because he is satisfied, that in the time allowed him, he could do nothing with the points. All the Hebrew students are required to be furnished with Parkhurst's Hebrew Lexicon, a circumstance significant of the low state of oriental literature in Scotland. Those parts of the Old Testament, which are written in Chaldee, are not read, because the students have no dictionary for that tongue. At the Marischal College, Aberdeen, the professor of Hebrew remarks, that "when he can get his class together, he lectures, either upon the origin of the language, or upon Hebrew antiquities. Chaldee and Syriac are not taught, because the professor can hardly ever get his students to be masters of Hebrew."

The truth is that biblical literature is in a low condition in Scotland; and the Scotch are far behind the scholars of England with regard to their acquaintance with continental, especially German, learning. If the Scottish ministers would do the highest good to their beloved communion, they must become earnest students of the original Scriptures; and this may be done while adhering as firmly as ever to their system of divinity.

To speak more generally, there is a necessity for improvement in the system of teaching and in the organization of the Scottish universities. Improvement, not reform, is required. The complaint is not that they have retrograded since the time that they obtained a European reputation, but that they have stood still, while science, learning, and society have been advancing. We go farther, and assert that the Scottish universities have become aggregations of lecture rooms, where young men are taught at second-hand what others have discovered, rather than institutions in which active and inquiring minds are busy at the work of discovery, giving a new form to science, and extending the sphere of its exertions. These institutions should be so organized and conducted as to furnish the greatest possible amount of practical talent for filling the offices of divine, lawyer, physician, and at the same time to afford training places for bringing out in its full lustre, that higher and inventive genius, which by its scientific discoveries lends additional efficacy to these—and indeed to all branches of human exertion. We are justly proud of our Mechanics' and other popular Institutions. The abundance of these, however, is only an additional reason for straining every effort to elevate the character of our Universities. These popular institutions disseminate a knowledge of the results of scientific inquiry. But to prevent the degenerating into lifeless and shallow babble, it is

necessary that exertions be made to keep up the supply of really learned, powerful, and indefatigable original thinkers. It is only in the sterner discipline, in the more arduous and unremitting labors of truly scientific education, that such men can be formed. It is for the attainment of this end—it is to prevent the stream of learning from becoming shallow when its surface expands, that we call for university improvement in Scotland.

We have only now to add that Oliver and Boyd's New Edinburgh Almanac is by far the best national record of Scotland that exists, or that ever was attempted to be compiled. Year after year it improves, and we safely pronounce it to be not only a standard authority on every subject connected with Scotland, but even as a general register for England, Ireland, the various European States, and the distant dependencies of the British Empire.

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#### ARTICLE IV.

##### OF THE SPIRIT OF INDEPENDENCE, AND THE SPIRIT OF ASSOCIATION

Translated from *Le Semeur*.

By the Junior Editor.

As the subject of association in labor and living is at present brought prominently before the public in lectures, published volumes, and newspaper essays, it may not be uninteresting to our readers to peruse the subsequent remarks of a countryman of Fourier, the great French advocate of the principle of association in the organization of society.—Jr. Ed.

Our object is simply to propose some doubts in respect to the mode of organizing labor, advocated by certain economists. Perhaps it is proper for no one to affirm anything on such a subject, before a serious experiment has been made; and that has not yet been.

In the plan of association devised by modern reformers, it seems to us, that far too little account is, in general, made of our personal and domestic independence. The individuals are ranged, like the soldiers of a regiment, on one and the same line; an open breach is made into the sacred enclosure of the family; and all this, without reserve, without offering any apology to our spirit of freedom, without any signs of believing that there is the least difficulty about such an organization. The question is presumed to be decided, provided it be proved, somehow or other, that every one will derive from it a vast amount of material advantages. You will be less independent, you will not perhaps be entirely so, but you will have in return more money: will you hesitate to choose?

But let us see. The principles propounded by the humanitarian school as infallible axioms, need to be carefully reviewed, if we would not learn, to our sorrow, that it is always good to reflect before acting. We shall only, at present, consider the projects of agricultural associations; the industrial associations will open the way for other observations, on which it is not our intention to dilate.

One thing is certain. Every association formed of twelve or fifteen hundred persons for the cultivation of an extensive domain, will be compelled to restrain, within the straitest limits, the liberty of the associates. Can we conceive of the existence and permanence of such an enterprise, without regulations very detailed, very complete, very rigid, which each individual must be bound to obey, under pain of considerable forfeitures, and of expulsion in case of defection.

If each one remains master of his own pleasure, works where he pleases, folds his arms when he thinks proper, chooses his own department of labor in the common cultivation according to his liking, the lessors of the land had better at once have thrown their money into the river.

If each is at liberty to determine the method of culture which may appear to him the best, and to furnish himself with the tools which he finds most convenient, the result would be about the same. What success, what possible existence with such liberties!

There must, therefore, by all means, be regulations the most minute and strictly obeyed. Moreover, as the laws cannot foresee and provide against every thing, and as they must also be applied by a vigilant and permanent authority, there will be required a superior administrative direction. There will be a small number of superiors, or better still, one supreme director, and all the associates must conform themselves with docility to the orders issued. That the supreme direction might be elected, and that the association may establish a representative government on a small scale, is of no moment; for at last, personal independence must always be surrendered.

There is not a man of good sense, who must not at once admit these necessities. To pretend to conduct to a beneficial result, an enterprise, in which twelve hundred persons participate, leaving individual wills independent, would be an idea unworthy of a moment's discussion.

In such an organization, what will be the position of the mere laborers, that is to say, of the immense majority of the associates? Will it differ much from that of the day-laborers or valets on an ordinary farm?

As to the pecuniary question, indeed, it is expected at least, that the associates will have, besides the price of their work, a portion of the general profits, if any. But as to the question of independence, we cannot see any essential difference between the associates and our day laborers. In both cases, there is subjection to a superior and absolute will; obedience in all things, at all hours; no spontaneity in their mode of being and doing; no liberty in any respect.

It seems to us even that the associates will find themselves, in some



respects, in a worse situation than that of day laborers. A valet of a farm sustains a near relation to his master, especially when that master is a proprietor of the third or fourth order. He lives familiarly with him, sits besides him at his table, takes part in all the events of the family, gives his opinion on the measures to be adopted, the processes to be pursued in the culture of the earth; and sometimes his opinion prevails.

But in an association of the kind here contemplated, the distance between the lowest of the laborers and the chiefs of the establishment will be incomparably great. There will be little connexion between them except that of official relations. Nothing of familiar and intimate intercourse. See those who are employed in our large manufactories at present. Are not the workmen, despite the progress in civil equality, much more distant from the owner than their fathers were in the small factories of former times? Where is the wealthy manufacturer who invites to his table one of his own workmen, or even his foreman? It is as much as a bargain if he knows them by sight.

The right of an associate, in the new agricultural enterprises, believe us, will amount to nothing, or we are much mistaken. It is not the right of receiving, at the end of the year, a thousandth or two thousandth part of the total profits, that will do much towards placing the simple labors on a par with the superior of the establishment and the great lessors of the property. These, who live as the real proprietors, will, after all, form a separate grade, notwithstanding your beautiful Utopian schemes of associated happiness, and the rest will be excluded into a sort of caste, from which they will only be able to escape by force of genius. But, genius is always an exception, and be assured, it will be the more so, as spontaneity will be the more clogged.

We speak not, now, of all the species of injustice which may be connected with such an enterprise. We allege not the almost inevitable preferences, the probable unjust favors, the possible frauds. We abstain from inquiring whether the domestic affections, the analogies of character, the interested complaisances of an inferior towards a superior, the passions in fine and vices, a habitual accompaniment of humanity, will not be continually lifting up cries and lively complaints. We confine ourselves rigorously to the question of personal independence, supposing, by a gratuitous hypothesis, that all the rest will go well.

But, that state of things being established, we demand who are the individuals that will enter your association?

You will find, we avow, and without taking much trouble, some young people and some dotards of maturer years, who are impassioned with all novel ideas. They are ready to enter into any association, which seems to them to depart from the common way. They also calculate with certainty, on their occupying an important place, and performing functions suitable to their merit, or to such as they attribute to themselves. But it would be foolish to seek among them materials for forming the corps of laborers, properly so called. Be sure that they will not till the soil, unless on some brilliant occasion, like the Emperor

of China, or General Bugeaud at Algiers. They will not bear the burden of the heat of the day ; they will, if they do anything, not obey, but command. It will be a second edition of the Saint-Simonians of Ménilmontant, and the founders of, I know not what, *phalanstère—model society of a new social establishment*—near Paris.

Those intellectual and indocile laborers are not sufficient, you will allow, to cultivate a farm. You need persons who will apply themselves to practical agriculture, and consent to put to a hand seriously and perseveringly : you require associates from amongst our proprietors of fields and our day-laborers. Well ! it is here, we believe, that you will run counter to the spirit of independence, and that your plans, so beautiful on paper, will vanish as a chimerical dream.

We doubt much, in the first place, whether the proprietors, however limited their possessions, would exchange their present estate for what you have to offer them. If they do live miserably, and that is in effect the lot of the greatest number, they live, at least, independent of all control. They are their own masters, and of their houses. The lowest of the proprietors of France is king upon his little corner of land ; he is sovereign under his thatched roof.

What then will you give him in lieu of that sovereignty ? for our small proprietor will not be in the first rank of your operators ; he must descend to one of the most humble, and thenceforth must undergo complete subjection, as we have shown you. What will you offer that sovereign then to engage him to become the docile servant of your association ? What ! the prospect—and what an uncertain prospect too—of a triflingly greater benefit. He will have, perhaps, every thing considered, and admitting an improbable prosperity, after ten years of experiment and of mishap, he will have some hundreds of francs, which he would not have had by remaining his own master. And do you believe that that alone will suffice to determine him to the sacrifice of his personal liberty, the most precious of all liberties ?

Some one will perhaps say, that we attribute gratuitously to the peasants our own repugnances, and that they will not suffer all that we make them suffer by anticipation. Experience proves, on the contrary, that the peasants are more inflexible on that point than the inhabitants of towns. Go into our fields, and see with what ardor our peasants aspire to the possession of a small property ! They would have less labor, would acquire more, and would lead a life certainly more easy, by living on the service of others. But what is trouble to them, what the most severe drudgery, provided that they are endured for their own benefit. As soon as they have laid up a little they buy a field, whatever it cost. If they have not money enough to make the entire payment, they borrow ; and observe that the interest of that money is more than the product of their morsel of earth. That is all one : they will augment that product by rugged, unceasing, incredible toil ; they will work fourteen hours a-day ; will content themselves with the coarsest food ; will impose on themselves the most severe privations, and wherefore ? to be their own masters. Their property is liberty, is independence. They

will submit to death, if need be, but they will not be in subjection to any person : they think no expense too great to purchase their freedom.

And do you imagine that they will at once renounce their independence on the promise of a participation in the common benefits of a *phalanstère*, and subject themselves to the necessarily absolute régime of an association ! As well might we suppose that, at the word of our new reformers, they would cease to be men.

It is very possible, that some of them, not having taken time to examine the subject, may allow themselves to be at first seduced. But it will be a very small number, and we much fear that those very persons, after three months, would abandon the association, cursing the fatal day that induced them to enter it. Give up all hope, therefore, of attracting the small proprietors.

There now remain those who have nothing, the valets of the farm, the hired men. You will have enough of them, if you wish ; but take care there. One of two things will occur. Those persons will either not acquire more in their new position than they could do before, or they will obtain a large profit. In the first case, they will regret, for the most part, having quit a single master to be subjected to many. In the second, will not the desire of independence, so natural, so profound, be roused up within them ? And when they shall have saved a little of their earnings, will they not seek to have a property which they can cultivate according to their own fancy ?

But in our association, some one will say, they will be already co-proprietors. Yes, co-proprietors of a very minute fraction ; co-proprietors on condition that they will do only what they are commanded to do. That is precisely the history of the benefits which appertained, under the ancient régime, to every village. Did the inhabitants strenuously hold on to those common benefits ? And as soon as they obtained the privilege of selling them in order to form, each for himself, a real individual property, did they not embrace it with the utmost eagerness ?

These are some positive facts, it seems to me : and they lead me to feel provoked at the great reformers of our epoch. They can lament that spirit of independence, natural to man, but they must acknowledge and accept it. Human nature is stronger than systems, which perhaps is no misfortune.

But, replies some one, there would be a progress in passing from the state of *morcellement*—division of property into parcels—to that of association, as there was in passing from the savage state to that of our civilization. The people wandering in the deserts and forests, wish not our laws, our quiet, domestic habits, the thousand obligations, the thousand proprieties which we are obliged to observe. Are they therefore right ? Is not our civilization preferable to their wild independence ? Would we, at this hour of the day, exchange our position for theirs ? Why then may we not hope that men will consent to go one step farther, by organizing everywhere vast agricultural associations ?

Our answer will be clear and simple. There is here a prodigious error of fact. If the savages are less dependent than we in some re-

spects, they are much more in others. If they have neither laws, nor ramparts, nor workshops, nor houses, they have among them, nevertheless, some relations more constrained than ours. They pursue the chase in common; they tend their flocks in common, when they have any; they share the fruits of their hunts and of their labors. Read M. de Chateaubriand's account of the red men of America. Ask voyagers what they have seen in Australasia? Community is found there more than in our regulated, civilized societies. Each there lives at the expense of all, and all of each.

They confound the savage state with absolute isolation. But where is that isolation? Where shall we find it but in the Utopian schemes of some philosophers? It is pretty indeed for those dreamers to extol the independence of the savage state as the basis of their cabinet! As the only penalty for so great an error, I would condemn them to be subjected to that independence for only twenty-four hours. They would come back from the experiment thoroughly reformed in their sentiments.

Our civilization has reduced those common obligations to the most restricted limits possible, in order to guarantee to us the full liberty of all the rest. This looks like a paradox; but our debts once paid, we are, as to our family, our property, our labor, and as to the future state of our wives and children, more independent than the freest savages on the globe.

Consequently, the example adduced against us, is in our favor. Humanity, in its continual progress, tends incessantly to make us more secure in the liberty of doing as we please, and of enjoying what we possess. It strives more and more after a conformity with that longing for domestic and personal independence, which God has implanted in us along with the sentiment of our responsibility. These two things are intimately connected, and in their profoundest source are identical. But the same men who pretend to associate in every point the whole human race, do they contest the principle of individual responsibility in order to leave standing only that of a vain collective responsibility? They are more logical in that than they perhaps suppose.

Consider well: would not your associations cause us to recede, rather than to advance in a political and moral point of view? Would it not be returning to the institutions of Sparta, with this difference, that community there had for its object war, whilst the final end of ours would be industry? Would it not be to recommence, after some sort, the feudal régime, which also had its extensive domains cultivated by the thousands of serfs under one master, with this difference, that the serfs of our day would have their petty part in the distribution of the common benefits?

Let the swarms of bees be associated in their hives; 'tis well: but were the bees, which have only instinct, made to serve as models for intelligent beings? And shall the men of the nineteenth century be urged to subject themselves to a despotism more than Oriental, exercised by the queen-bee of a hive?

At the close of the last century, there arose complaints so loud against



free corporations and wardenships, that it became necessary to abolish them. But will not what is now proposed impose a yoke very much more intolerable in other respects than that of those institutions? For in that case the object was to associate in one privileged corporation, preserving, after that, personal liberty. In this we should be obliged to sacrifice that altogether and always. What perfection! What progress!

There are, incontrovertibly, serious inconveniences in the existing state of things. In the industrial department an unlimited combination; in agriculture a fractional division almost indefinite; among the laborers of the towns and of the country, great sufferings, although exaggerated by party-spirit. But it lies in the condition of humanity, that every advance has its corresponding evils, as every light its shadows. Let us struggle against those evils; let us strive to diminish their force and number. We are able, we must; only let us not, in order to avoid the inconveniences, annihilate the advance itself, and return to those institutions that have served out their time!

We close as we commenced. Let the experiment be made seriously; let the disciples of Fourier establish their phalansière at Cîteaux; let the author of the project of a Christian community have the means of executing it; let them both be more fortunate than Robert Owen, who has twice miserably failed; their success will dissipate our doubts, and we shall not be the last to applaud.

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## ARTICLE V.

### SKETCHES AND PORTRAITS FROM THE HISTORY OF THE MAHOMEDAN DOMINION IN INDIA.

From the Asiatic Journal, April, 1842.

"THE days of man are as grass; as a flower of the field, so he flourisheth, for the wind passeth over it and it is gone, and the place thereof shall know it no more." We have placed these solemn words of Scripture at the head of this article, without any intention of writing an homily upon them. The reflection is one which must often occur to all who are in the habit of meditating on the instability of human greatness; but it is nowhere more strongly illustrated than in the history of the Mogul empire in India, and we found ourselves almost unconsciously uttering it, when closing the instructive and entertaining volumes in which the old traveller Bernier has given an account of his sojourn in that country.

There has never been a succession of more splendid princes (in the literal sense of the word) than the Mogul emperors of the seventeenth century. Their extensive dominions—which included the richest and most fertile portions of the earth's surface, and in which they were not

merely sovereigns, but possessed so large an interest in the soil, that to the eyes of European inquirers, it seemed as if the monarch was the only landed proprietor in the country—yielded them a revenue such as few mortals have ever had at their disposal, and which it required some ingenuity to expend. Its fortunate possessors partook largely of the Asiatic fondness for pomp and show, and indulged freely in all the costly tastes and pleasures by which royal purses are usually drained. They delighted in well-stocked harems, and numerous and brilliant retinues. A host of beauties, the choicest flowers of Asiatic loveliness, were collected from all parts for their domestic solace, and entertained with a magnificence worthy of their own charms and of an imperial lover. They were lodged in elegant pavilions, formed of the purest white marble, wainscoted with lofty mirrors and tapestried with the richest brocades, and prodigally supplied with every luxury which the wantonness of fancy could suggest. Troops of eunuchs and slave-girls were ever on the watch to do their bidding, and their most extravagant whims were so anxiously anticipated, that according to the report of an inquisitive Italian physician, whose profession gained him admittance into the harem, they were considerably provided with silken dresses so exquisitely fine, as to weigh altogether only half an ounce, the better to enable them to support the heat of the climate and the profusion of jewels with which they were almost overwhelmed. Twice a day, the proudest nobles of the land came to offer their homage at the foot of the throne, and the monarch seldom stirred beyond the walls of his capital, or even of his palace, without some thousands of horsemen by his side.

Several of the Mogul princes were distinguished by a passion for architecture. The greatest of European sovereigns, imbued with a similar taste, is usually contented if, in the course of his reign, he can complete two or three tolerably handsome structures, and is even well pleased if by improvements or alterations he can acquire a title to call a park or a street after his name. But the Mogul monarchs had much more abundant materials at their command, and their operations were proportioned to their means. The very tombs which they raised over the remains of their deceased relatives would elsewhere have been thought fit for temples or palaces, and it is not to be wondered at if the buildings which were actually devoted to these purposes still excite the admiration of all beholders by their almost unequalled beauty and magnificence. But no single edifices, however stately, can give an adequate idea of the scale on which the architectural operations of the Mogul emperors were conducted; they had but to give the word, and, in a few years, a range of rocky hills became the site of a new metropolis, fitted in all respects for the reception of half a million of inhabitants; and history presents more than one instance in which a creation of this kind was commenced and completed by one prince. Yet, notwithstanding these expedients, the Mogul monarchs were often embarrassed by the superabundance of their wealth, and seem to have been unable to find an use for their hoards of gold, and silver, and jewels, without employing them as the actual materials of building or furniture. Some of the

halls in the palace of Delhi had their floors and ceilings covered with plates of silver, and the walls and columns, of the finest white marble, were inlaid with elegant flower-work, composed of cornelians and other precious stones, and most delicately and tastefully executed. There was also a gallery, which it had been originally intended to cover completely with the foliage of a golden vine, bearing emeralds and rubies, fashioned so as to represent the fruit at different stages of ripeness; but only three stocks of this vine were actually formed, the materials required for the remainder having, perhaps, been already expended on those far-famed thrones, which far outshone the other wonders of the palace. Of these, no less than seven are enumerated by Tavernier, a French diamond-merchant, who visited India about the middle of the period we are speaking of. He evidently examined them with a professional eye, and has given a very sober and tradesmanlike account of them. Five of them, he says, were entirely covered with diamonds; another, seven feet long and four broad, shone all over with diamonds and pearls. The remaining one was the celebrated *Tukt Taous*, or peacock-throne, so called from the golden peacock with tail outspread and consisting entirely of sapphires and other colored stones, which stood on the top of an overhanging canopy. This throne was somewhat of the shape of a camp-bed, and much about the same size, six feet long and four broad. Nevertheless, according to some accounts, the whole body was of solid gold. Tavernier does not tell us what was the principal material, but he gives a sort of inventory of the jewels which adorned it; he counted 108 pale rubies, weighing from 100 to 200 carats each; 139 emeralds; a lining of diamonds and pearls on the inner side of the canopy, and a fringe of pearls round about; rows of fair pearl round the twelve pillars that support the canopy; and so he goes on, with his appraiser-like list, which, however, from its evident fidelity, affects the imagination more than the most highly wrought description.

It must be allowed that the trappings of monarchy were never more gallantly bedizened; and, surrounded by so much splendor, and breathing only an atmosphere of adulation, the Mogul emperors may well be excused if they were apt to over-estimate their own importance, and to fancy themselves without rivals among mankind; so that, on their accession to the throne, they were accustomed to discard familiar names by which they had been known from their infancy, and to take some more sounding title, such as "Lord of the Universe," or "Conqueror of the Earth," for their ordinary appellation. Their own were not the only eyes that were dazzled by their splendor; their fame had travelled to the ends of the earth, and the title of "Great Mogul," by which they were known in Europe, and which has become a proverbial expression in our language for the superlative degree of pomp and grandeur, remains to show with what wonder, not unmixed with awe, our ancestors, at no very remote date, listened to the tales they heard of the mysterious monarchs of the gorgeous East.

Alas and well-a-day! a century and a half have not yet elapsed, and

the glory of those monarchs has passed away like the glare of a candle. Their degenerate representative no longer rules over realms so vast that three months were commonly spent in passing from one extremity to the other;\* no golden rills flow unceasingly into his treasury; his authority is confined to his own household; of all the possessions of his ancestors, nothing now remains to him but a dismantled palace, from which almost every thing portable has been carried off by successive spoilers. The Persian king is now the owner of the *Tukt Taous*, and all the other celebrated thrones have long since disappeared from the palace of Delhi. The floors and ceilings have been stripped of their silver ornaments; the inlaid gems have been picked out of the marble, and the only tapestry that is now seen on the shattered walls and columns is what the spider weaves. In these desolate halls, where every object suggests a contrast between his own despised condition and the high estate of his forefathers—dependant for his daily bread on the bounty of foreign conquerors, yet, with wilful self-mockery, mimicking the airs and gestures of royalty—dwells the helpless descendant of a long and illustrious line of princes—of the frank and generous Baber, and the high-minded Acbar, the magnificent Shahjehan, and the profound Aurungzebe. How are the mighty fallen! These names are, indeed, but little familiar to English readers. In fact, with the exception of, perhaps, the last, we suspect they are nearly unknown to almost all but those who have been led by personal motives to pay particular attention to Indian affairs. Englishmen, who seldom bestow more than a passing glance on the recent achievements of their own countrymen in so remote a field as India, are not likely to open the chronicles of a strange and bygone race in the same quarter; and those adventurous students, whose curiosity leads them so far, are soon perplexed by the strangeness, as well as by the sameness, of the names and phrases they meet with, and generally close the volume with disgust. The few, however, who possess more perseverance, are well rewarded for their trouble; for, whether their object be merely to beguile a vacant hour with tales of daring adventure, or to exercise the mind in researches into the recesses and windings of human character, or to learn lessons of political wisdom by tracing the connection of events and noting their influence on national prosperity, they will seldom find richer materials for their purpose than in the history of the Mahomedans in India. We propose to illustrate the truth of this assertion, by occasionally placing before our readers some of the most attractive portions of this history, without giving them the trouble of seeking for them. Strict chronological order is not indispensable in a periodical work, and need not be allowed to fetter our selection, which will accordingly be made at random, our first specimen being taken from the life of Aurungzebe.

This prince, in the opinion of his countrymen the most eminent of their rulers, was third of the four sons born to the Emperor Shahjehan

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\* Bernier, tom. i. p. 271.



by his favorite wife, of whom he was so fond, that, with a moderation somewhat unusual among Mahomedan monarchs, he married no other while she lived. The natural superiority, both physical and mental, of Europeans over Asiatics, is so generally taken for granted by the former, that it may not, perhaps, have been remarked, how striking an exception to the rule is presented by the royal families of the two continents. In Europe, it seldom happens that the founder or most distinguished member of a dynasty transmits any considerable portion of his talents to his posterity; whatever may be his own intellectual eminence, his descendants generally fall ere long to the level of very ordinary men, and often sink a good deal below it; while in Asia, the early caliphs, the Ottoman sultans prior to the seventeenth century, and above all, the lines of Gengiskhan and Tamerlane, especially after their union in the person of the Emperor Baber, exhibit longer successions of men of extraordinary ability, than have ever, perhaps, been observed in a private station. The degeneracy of European princes is sometimes attributed to the frequent intermarriages which take place between their families, and the intellectual superiority of their Asiatic rivals may very probably spring from an opposite cause—the wide range taken by Asiatic sovereigns in their search for proper inmates of their harem. The empress of Shahjehan belonged to a Persian family, the members of which, for at least two generations, had been highly distinguished by their qualities both of mind and body, and her children were no disgrace to the pedigree of either of their parents. Dara, the eldest, possessed a fine person, dignified manners, and a frank and generous disposition, and was deeply imbued with the love of literature and the spirit of inquiry, by which so many of his ancestors had been characterized. Like his great grandfather, the illustrious Acbar, he perceived the absurdities of Mahomedanism, and took no pains to conceal his contempt for them, and he was fond of engaging in religious and metaphysical discussions with the Jesuit missionaries resident in the capital, and with the most learned of the Hindoo priests. His imagination seems to have been most powerfully affected by the sublimity of some of the doctrines inculcated by the latter. He caused Persian translations of their sacred books to be made for his use, and composed a work designed to reconcile the conflicting tenets of the *Vedas* and the *Koran*. This open profession of infidelity, however, did not fail to shock all zealous Mussulmans, and the enemies whom Dara thus created were increased in number by his behavior to those about him; for, although generally gracious and affable in his manners, he was self-sufficient, impatient of advice, too plain spoken in expressing his opinion of others, and apt, when provoked, to vent his anger in insulting words and actions. Suja, the second son, had much of Dara's character, with, however, more prudence and self-command. He also gave general offence by his religious sentiments, which corresponded with those of the heterodox Sheeah sect. Murad, the youngest, was a high-spirited youth, but too fond of pleasure to evince much capacity. Aurungzebe was in most respects very different from all his brothers. His form was under

the middle size, but slender and well-proportioned; his manners were engaging, his conversation was agreeable. He inherited a full share of the courage which was hereditary in his family, and his energy, activity, and presence of mind, have never been surpassed; but he added to these qualities an equal portion of prudence and circumspection, a keen insight into character, and a thorough acquaintance with all the arts of dissimulation. His temper and passions, none of which seem to have been very violent, were under perfect control. Pleasure had no charms for him. He had early evinced a strong turn for religion, and its influence over his mind was shown, not merely by the constant practice of devotional exercises, but by his ascetic habits, and by the humility and meekness of his deportment. At one time, he had formed the idea of renouncing the world, and of spending his life in solitary contemplation; but nature had not intended him for a recluse. His great capacity for business was joined, perhaps unconsciously to himself, with an activity of mind which combated his love of retirement, and made him seize with avidity every opportunity that was offered to him of assisting in the administration of his father's extensive empire.

That empire comprehended the whole of the north of India, from the Himalayas to some distance south of the Nerbudda, and from the Brahmputra to the Indus, as well as the country westward of the last-named river, as far as Candahar; but the emperor's authority was far from being equally effective in every part of these extensive dominions. The large divisions of which they were composed were governed by viceroys, who raised and maintained armies of their own; appointed and displaced all functionaries, civil and military; and, in short, were subject to little or no interference from the sovereign, provided only they were punctual in their remittances of the revenue, and refrained from acts so oppressive as to excite very loud complaints or very considerable disorders. Some large territories were held on not dissimilar conditions, as hereditary possessions, by descendants of their ancient Hindoo rulers; and in the less accessible parts of the country, particularly in Rajpootana, were several native chiefs, who had never been thoroughly subjugated, and who, though professing allegiance to the emperor, gave few other signs of dependence than by following his standard in war. In addition to the dangers to be apprehended from the discontent or ambition of these formidable vassals, the constitution of the imperial harmony furnished further cause for uneasiness. Besides the contingents of governors of provinces and native princes, the Mogul troops consisted almost entirely of foreign mercenaries, collected from different parts of Asia—Persians, Affghans, Tartars, Turks, and Arabs. Some individual soldiers were directly in the emperor's pay, but a much greater number were enlisted by the *grandeos* of the empire, who constituted a true military aristocracy, each member of which held lands or received stipends from the government, on condition of maintaining a certain force, varying in amount according to the extent of his grant. Many nobles maintained bodies of horse, several hundreds and even

thousands strong,—and these bands of brave and devoted adherents often enabled a popular commander to defy his sovereign with impunity.

Such was the internal state of the empire, and its foreign relations were equally unsettled. At the accession of Shahjehan, the southern frontier lay near the Nerbudda. Beyond that river, in the Deckan, were the three independent Mahomedan kingdoms of Ahmednugger, Golconda, and Bejapore, the subjugation of which had always been a favorite scheme of the Moguls, and generally gave employment to their arms when they were not occupied elsewhere. Along the greater part of the northern frontier, the lofty Himalayas afforded sufficient protection against hostile inroads; but on the north-east, the Persians were ever on the watch for an opportunity of assailing their neighbors, and, ever and anon, the wild tribes from beyond the Hindu Koosh would carry havoc and desolation into the green and fertile valleys of Cabul.

With so many claims on his attention, Shahjehan needed all the assistance he could derive from the talents of his children to maintain quiet at home, and to prosecute his ambitious projects abroad, and the jealous policy which, in some Eastern countries, condemns the monarch's relations to seclusion till they are called from a prison to ascend a throne, did not prevent him from placing all his sons in situations of high trust and responsibility. Dara, as heir-apparent, was usually retained at court; but his brothers generally held high commands at a distance from the capital, and the valuable services of Aurungzebe, in particular, could seldom be dispensed with. While only thirteen years old, he was sent, under the tuition of a more experienced general, to suppress an insurrection of the Rajah of Bundelcund, and, notwithstanding his extreme youth, his counsels and suggestions were esteemed to have contributed much to the success of the campaign. Nor is there any thing in this at all incredible. We are so accustomed to heap the highest honors on military skill, that we are apt to regard it as the first of human accomplishments; but it certainly does not require either: more mature or a more exalted intellect to perceive at a glance the capabilities of a position, to arrange troops properly in battle array, to detect the aims and foil the manœuvres of an enemy, than to invent ingenious mechanism, to compose fine poetry, or to form a complicated tissue of mathematical combinations; and as all these things have been repeatedly done by precocious children, it is quite possible that others may have exhibited an equal talent for the science of war at an equally early age. At a somewhat later period, Aurungzebe was despatched to Balkh, to repel and avenge an irruption of the Usbeck Tartars, and he afterwards made two successive attempts to recover the then strong fortress of Candahar, which had been seized by the Persians; and there can be no better proof that he acquitted himself well in these expeditions, than that, though unsuccessful, he returned from them with an increase of reputation. He was next made governor of the Deckan, where the Mogul territories had lately been greatly extended, by the

conquest of the kingdom of Ahmednugger. Here, in his capacity of viceroy, he carried on a successful war, first against Golconda, and afterwards against Bejapore; dictated to the first the most humiliating terms of peace, and had brought the other to the verge of ruin, when he was called from the prosecution of his conquests by the occurrence of events in another quarter, in which he was still more deeply interested.

The Emperor Shahjehan, whose early administration had been marked by the most unremitting attention to business, had of late given himself up to a course of shameless debauchery, which soon completed the ruin of a constitution already enfeebled by age, and he now fell dangerously ill of a disease "*peu convenable*," says Bernier, "*à un veillard de soixante-dix ans, et plus, que devoit plutost songer à conserver ses forces qu'à les ruiner comme il fit.*" For some days his life was despaired of, and even after he rallied a little, he continued incapable of attending to public affairs, so that Dara, who had already been admitted by his father to a large share of power, and had been placed in rank almost on a level with himself, now took the reins of government entirely into his hands, and by so doing gave the signal for civil war throughout the empire.

In most Asiatic states, particularly in those in which the ruling family traces its descent from some wandering tribe, the claims of primogeniture are little regarded in the succession to the throne. The government of a predatory horde, of which it may in general be said "their hand is against every man, and every man's hand against theirs," requires too much vigor and activity, both of mind and body, to be wilfully entrusted to incompetent hands; and as the performance of duties by proxies is too refined a notion for so rude a people, the nearest relative of a deceased chief, if disqualified by extreme youth or any other cause, is set aside without scruple, and some fitter person is selected, (from the same family, if possible,) to fill the vacant office. When any of these tribes settle down in a country which they have conquered, they usually carry their old maxims on the subject of inheritance into their new possessions. This was the case, to some extent, even in Europe, among the rude founders of the kingdoms which were built up out of the ruins of the Roman empire; but there the revival of Roman literature led to the gradual restoration of Roman jurisprudence, and the introduction of many of its doctrines, including its law of succession, into the Barbarian codes. But in Asia, the custom of the desert may be observed in the longest established monarchies; and by the Tartar conquerors of India, in particular, it was retained as long as their empire lasted. All the sons of the reigning monarch were considered to have an equal right to aspire to the throne, and their father was at liberty to select his successor from amongst them, without regard to seniority. This declared preference to one, however, by no means destroyed the pretensions of the others. The appointed heir had often to make good his cause by force of arms, and he seldom felt himself secure until he had got his rivals into his power, and had con-



signed them to death or imprisonment. The apprehension of this fate, on the other hand, gave to them another motive for opposition besides ambition. However willing they might be to remain in retirement, they felt that they were not safe from molestation; and thus, whatever might be the bent of their disposition, they had no choice but to aim at the throne, or sink into a dungeon or the grave.

Such was now the position of the four sons of Shahjehan. Dara, the eldest, though generally looked upon as heir to the throne, had never been expressly declared to be so, and he knew that he would have to contend with the rivalry of his brothers; while they, even if they had been willing to renounce their own claims, felt that they could not safely trust to Dara's forbearance. That prince, indeed, did not attempt to dissemble his feelings towards them. One of his first acts, on assuming the imperial dignity, was to seize on their agents in the capital, together with their papers and money, and to forbid all persons from communicating with them; and by this open intimation of his suspicions, he compelled them in self-defence, to resist his elevation. All three were, at this time, present at the seats of their respective governments—Sujah being viceroy of Bengal, Aurungzebe of the Deckan, and Murad of Guzerat—and they all began to prepare for the impending contest. Sujah was the first to take the field, the wealth of his fertile province furnishing him abundantly with the means of collecting a formidable army, at the head of which he immediately advanced towards Agra, professedly for the purpose of avenging the death of the emperor, whom he asserted to have been assassinated by Dara. Shahjehan, who had partially recovered from his illness, was now in a state of great perplexity. He seems to have entertained a genuine affection for his children, such as we are not accustomed to look for in an eastern despot, and he shuddered at the prospect of their engaging in a strife which could not fail to involve some of them in destruction. But it was in vain that he tried every expedient to prevent matters from coming to a crisis. His letters to his insurgent sons, assuring them of his convalescence, and commanding them to remain quiet, were treated as forgeries of Dara. Sujah continued to advance, and the emperor was compelled to despatch an army to arrest his progress, nominally under the command of Soliman, son of Dara, but more immediately under the control of an experienced Hindoo general, the Rajah Jye Sing, who was secretly instructed to avoid a battle, until every other mode of inducing Sujah to retire had been tried in vain. The obstinacy of the latter, and the youthful ardor of Soliman, overcame the rajah's precautions, and an engagement took place on the banks of the Ganges, in which Sujah was worsted and driven back, though without very considerable loss, into his own province. In the meanwhile, Aurungzebe and Murad had not been inactive. The latter, a headstrong and thoughtless youth, though ill-provided with troops and money, and quite incapable of coping with the other candidates for the throne, had not hesitated to follow the example of Dara and Sujah, and to assume the imperial title; and he had commenced his

operations by the siege of Surat, where he expected to find a considerable treasure. Aurungzebe was more prudent: he also had but few troops under his immediate command, but the vizier, Meer Jumla, one of his most devoted partizans, was at hand with a body of 20,000 horse, which had been employed in a war against Bejapore. Some art was necessary, however, to obtain the assistance of this force, for Meer Jumla had left his wife and family at Agra, and with these precious hostages in Dara's power, he dared not openly take part against that prince. Aurungzebe removed the difficulty by an ingenious stratagem: he persuaded Meer Jumla to allow himself to be arrested and thrown into prison, and then, with the aid of some of his officers, who were in the secret, and by promises of additional pay, he induced the vizier's troops to enter his service.

Even with this reinforcement, he was far from being a match for his elder brothers, and he determined to make common cause with Murad. He accordingly wrote him a letter, full of expressions of esteem and affection; with respect to himself, he professed never to have aspired to the throne, but to have always evinced a preference for the life of a fakeer; but Dara being an infidel, and Sujah a heretic, and both, in consequence, unfit to reign, there remained none but Murad, whom, therefore, he was ready to assist with all his influence, provided only he were assured of being afterwards permitted to retire to some corner of his dominions, there to spend the rest of his days in solitude and devotion.

Murad was too much elated by this unexpected offer, which for the first time gave his ambitious project some chance of success, to question its sincerity. He at once accepted the proposition made to him, and having soon afterwards taken Surat, he agreed to join Aurungzebe with all his forces on the road to Agra. The junction accordingly took place at the appointed rendezvous, where Aurungzebe received his brother with every mark of humility and respect, and took the oath of allegiance to him as his rightful sovereign. The two armies then proceeded together till they arrived at a place on the river Sipra, fifteen miles south of Ougein, where they were stopped by the sight of an army sent against them by Dara, which had taken up a position on the opposite bank. Aurungzebe halted for two or three days, collecting and refreshing his troops, and then proceeded to cross the river. It was now the beginning of April, and the stream was very low; but the steep banks and the rocks, with which the bed was beset, would have made the passage a difficult undertaking, if the defenders had properly availed themselves of their advantages. But Dara's cause, owing either to the circumstances already noticed, or perhaps to the fact of his having generally resided at court, and seldom taken the command in any military expedition, seems to have been very unpopular with the army, and in this battle, his general, Cassim Khan, though a leader of acknowledged merit, showed so little vigor or ability, as to have incurred the suspicion of treason. His example was imitated by his soldiers, and the disgrace of the imperialists would have been as complete as

their discomfiture, but for the desperate resistance of a body of Rajpoots, the contingent of the Rajah Jesswunt Sing, who fully justified the reputation for heroic valor which, from the days of Porus, has been the heir-loom of their race. It is possible that, besides their habitual sense of honor and martial ardor, they may on this occasion have been animated by religious zeal—by partiality for Dara, whom they perhaps looked upon as a convert to their faith—and by hatred to the bigoted Aurungzebe. Be this as it may, their fury had been excited to a pitch bordering on madness. According to their custom before a battle, they embraced and bade each other farewell, like men resolved to perish, and then threw themselves on the enemy, with a rage which seemed to belong rather to wild beasts than to human beings. But undisciplined courage avails little in regular warfare, and their fierce but uncombined efforts could not withstand the firmness of their opponents—veterans trained in the Deckan wars, and now guided by the skill of Aurungzebe, and led on by the youthful gallantry of Murad. After a severe struggle, the Rajpoots gave way, if such an expression may be applied without disparagement to men, of whom, at the close of the combat, only five or six hundred remained alive out of a corps originally about eight thousand strong.

With this scanty remnant, Jesswunt Sing slunk back to his own domains ; but his reception there was ill calculated to soothe his wounded feelings. He was married to the daughter of one of the most distinguished chieftains of Rajpootana, and when he now approached his castle, his wife, with the spirit of a Spartan matron, ordered the gates to be closed against him. "It was impossible," she exclaimed, "that this dastardly fugitive could be her husband ; or, if he were, how was it that he had presumed to marry into her family, without imitating the virtues which had rendered it so illustrious ? But it could not be ; he must have perished in the field : " and, in the delirium of passion, she ordered the funeral pile to be prepared, that she might sacrifice herself to the manes of her departed lord. Nor was it till after some days that she could be persuaded to change this language, and admit her husband to her presence, on his promising to set out again to retrieve his character, as soon as he had recovered from the effects of his recent disaster.

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## ARTICLE VI.

## DISCOVERIES IN AGRICULTURAL CHEMISTRY.

## INTRODUCTORY NOTE.

THE class of American readers who feel no interest in the subject of agriculture must be very small. The cultivation of the soil in some form, and on a scale more or less extensive, may be regarded, in this country, as the universal profession. The philosophy of agriculture, therefore, among us, should constitute a portion of every man's stock of knowledge. Without some acquaintance with this subject, no one, whatever be his calling or profession, is prepared to discharge his duties as an American citizen, or properly to appreciate the best interests and prospects of his country. We cannot doubt, therefore, that some account of the recent discoveries which have been made in Europe, in Agricultural Chemistry, and of the practical application of its principles, will be acceptable to our readers generally.

The following article, as a sort of introduction to this subject, will be found valuable in itself. It presents principles and hints of the highest importance to such as are not already familiar with the science of chemistry and its applications to the useful arts. Our object, however, in selecting it for publication in the *Eclectic* is more especially to call the attention of our readers to the very valuable works of Professors Liebig and Johnston, both of which have been published in this country; that of Liebig having already passed through two editions. The work of Johnston, ("Lectures on Agricultural Chemistry and Geology,") has been recently published in New York, (Wiley and Putnam, 1842,) and is much more intelligible and better adapted to the use of agriculturists, who are not already familiar with the science of chemistry, than that of the German Professor, whose principles he adopts and illustrates in a practical way. See a notice of this work in the *American Biblical Repository* for April last, where we have commended it to our readers, as a highly useful book.—Sa. Ed.

From the (London) Quarterly Review, March, 1842.

*Organic Chemistry, in its Applications to Agriculture and Physiology.*

By Justus Liebig, Professor of Chemistry in the University of Gießen. Translated from the German MS. of the Author, by Dr. Lyon Playfair. 8vo. London. 1840.

PROFESSOR LIEBIG has long enjoyed an European reputation as one of the most profound and sagacious of chemists; and in particular has taken the lead, both by his personal labors and by those of the admirable school which he has formed in Germany, in those researches into the chemistry of the animal and vegetable kingdom which have, within the last fifteen years, created a new science, that of Organic Chemistry.



"Agriculture," he says, "is the true foundation of all trade and industry—it is the foundation of the riches of states. But a rational system of agriculture cannot be formed without the application of scientific principles; for such a system must be based on an exact acquaintance with the means of nutrition of vegetables, and with the influence of soils and action of manure upon them. This knowledge we must seek from chemistry, which teaches the mode of investigating the composition and studying the characters of the different substances from which plants derive their nourishment."—*Preface*, p. vii.

When Sir Humphrey Davy wrote on agricultural chemistry, Organic Chemistry was almost unknown. That happy genius did as much as could be done with the materials at his command, and established some principles of the highest importance. The work before us is an attempt to pursue the same path of inductive inquiry, with the aid of the more extended means which the present state of science affords.

Most of our readers are aware that the greater part of all vegetables consists of but four elements—namely, carbon, hydrogen, oxygen, and nitrogen; very often of the first three alone; while the remainder is composed of certain saline, earthy, and metallic compounds, which form the ashes that remain when vegetables are burned. The former are called the organic, the latter the inorganic elements of plants. Professor Liebig has demonstrated that the latter, although occurring in very small quantity, are yet as essential to the development of the plant as the former; and it is obvious that the first inquiry, in such a work as his, must be as to the sources from which all these necessary constituents are derived, and the best means of supplying them.

With regard to the carbon of plants, the general opinion of writers on vegetable physiology, and of practical agriculturists, attributes its origin to the substance called *humus*, or vegetable mould, which is present in all fertile soils, and which is merely the remains of former vegetables in a state of decay. This substance, either alone or in combination with lime and other alkalies, is believed to be absorbed by the roots, and thus directly to furnish carbon for the plant. But this view has been shown by M. Liebig to be quite untenable; and he has demonstrated, by a most ingenious and convincing train of argument, that the carbon of plants is derived from the carbonic acid of the atmosphere. We are tempted to quote pretty largely on this point, both because this section affords an excellent specimen of our author's reasoning, and also because, in the economy of nature, the supply of carbon to plants is beautifully associated with the restoration to the atmosphere of the oxygen removed from it by the respiration of animals and other processes, and thus preserves the air constantly in the same state of fitness for the life of animals.

After proving, from the analysis of the properties of *humus*, that it cannot yield to vegetables, in the most favorable circumstances, more than a mere fraction of their annual increase of carbon, he proceeds:—

"Other considerations, of a higher nature, confute the common view

respecting the nutritive office of humic acid (humus) in a manner so clear and conclusive, that it is difficult to conceive how it could have been so generally adopted. Fertile land produces carbon in the form of wood, hay, grain, and other kinds of produce, the masses of which, however, differ in a remarkable degree."—p. 13.

Here follows a calculation of the average annual produce of one Hessian acre of average land, in the different shapes of wood, meadow-hay, corn, and beet-root: the land in the two latter cases being manured; in the two former, the forest and the meadow, not manured. Notwithstanding the vast difference of bulk, weight, and shape, in these different forms of produce, the quantity of carbon in each is almost exactly the same, viz., about 1000 lbs. per acre. This interesting result, in the case of the forest, is derived from an account, on the best authority, of the quantity of wood annually cut for fuel in the admirably managed forests of Germany, without injury to the future value of the forest. This quantity may fairly be considered as the equivalent of the annual crop of an annual plant, such as corn, where the soil is judiciously cropped and not unfairly exhausted. In the cases of the hay, corn, and beet root, the crop was simply weighed, and the amount of carbon ascertained by analysis.

"It must be concluded from these incontestable facts that equal surfaces of cultivated land, of an average fertility, produce equal quantities of carbon; yet how unlike have been the different conditions of the growth of the plants from which this has been deduced!

"Let us now inquire whence the grass in a meadow, or the wood in a forest, receives its carbon, since there no manure—no carbon—has been given to it as nourishment:—and how it happens that the soil, thus exhausted, instead of becoming poorer, becomes every year richer in this element. A certain (and very large) quantity of carbon is taken every year from the forest or meadow in the form of wood or hay; and, in spite of this, the quantity of carbon in the soil augments—it becomes richer in humus.

"It is said that, in fields and orchards, all the carbon which may have been taken away as herbs, as straw, as seeds, as fruit, is replaced by means of manure; and yet this soil produces no more carbon than that of the forest or meadow, where it is never replaced. It cannot be conceived that the laws of the nutrition of plants are changed by culture—that the sources of carbon for fruit or grain, for grass or trees, are different. It is not denied that manure exercises an influence upon the development of plants; but it may be affirmed with positive certainty that it neither serves for the production of the carbon nor has any influence upon it, because we find that the quantity of carbon produced by manured lands is not greater than that yielded by lands which are not manured. The discussion of the manner in which manure acts has nothing to do with the present question, which is the origin of the carbon. The carbon must be derived from other sources; and as the soil does not yield it, it can only be extracted from the atmosphere.

"In attempting to explain the origin of carbon in plants, it has never

been considered that the question is intimately connected with the origin of humus. It is universally admitted that humus arises from the decay of plants. No primitive humus, therefore, can have existed; for plants must have preceded the humus. Now, whence did the first vegetables derive their carbon?—and in what form is the carbon contained in the atmosphere?

“These two questions involve the consideration of two most remarkable natural phenomena, which, by their reciprocal and uninterrupted influence, maintain the life of individual animals and vegetables, and the continued existence of both kingdoms of organic nature.”—pp. 14—16.

The two phenomena here alluded to are the well-known facts that the proportions of oxygen and carbonic acid gases in the atmosphere are, and have long continued, stationary; notwithstanding the enormous quantities of oxygen withdrawn at every moment from the atmosphere by the respiration of man and animals, as well as by the processes of combustion and putrefaction; the whole of which oxygen is converted into an equal volume of carbonic acid gas, and returned in this form to the atmosphere: so that we should expect the carbonic acid to increase exactly in proportion as the oxygen diminished, instead of the proportions of both remaining unchanged.

“It is quite evident that the quantities of carbonic acid and oxygen in the atmosphere which remain unchanged by lapse of time must stand in some fixed relation to one another; a cause must exist which prevents the increase of carbonic acid, by removing that which is constantly produced; and there must also be some means of replacing the oxygen which is removed from the air by the processes of combustion and putrefaction, as well as by the respiration of animals. Both these causes are united in the process of vegetable life.

“The facts stated in the preceding pages prove that the carbon of plants must be derived exclusively from the atmosphere. Now carbon exists in the atmosphere only in the form of carbonic acid; that is, in a state of combination with oxygen.

“It has already been mentioned likewise that carbon and the elements of water form the principal constituents of vegetables; the quantity of the substances which do not possess this composition being proportionally very small. Now the relative quantity of oxygen in the whole mass (of vegetables) is less than in carbonic acid. It is therefore certain that plants must possess the property of decomposing carbonic acid, since they appropriate its carbon for their own use. The formation of their principal component parts must necessarily be attended with the separation of the carbon of the carbonic acid from its oxygen, which latter must be returned to the atmosphere, while the carbon enters into combination with water or its elements. The atmosphere must thus receive a volume of oxygen for every volume of carbonic acid which has been decomposed.”—pp. 18—20.

After some details, proving, from the experiments of Priestley, Sen-

nebier, and De Saussure, that plants when exposed to light, really possess the property of thus decomposing carbonic acid, and liberating oxygen, Professor Liebig adds :—

“The life of plants is closely connected with that of animals, in a most simple manner, and for a wise and sublime purpose. The presence of a rich and luxuriant vegetation may be conceived without the concurrence of animal life, but the existence of animals is undoubtedly dependent on the life and development of plants. Plants not only afford the means of nutrition for the growth and continuance of animal organization, but they likewise furnish that which is essential to the support of the important vital process of respiration; for besides separating all noxious matters from the atmosphere, they are an inexhaustible source of pure oxygen, thus supplying the loss which the air is continually sustaining. Animals, on the other hand, *expire* carbon (as carbonic acid) which plants *inspire*; and thus the composition of the medium in which both exist, namely, the atmosphere, is preserved constantly unchanged.

“It may be asked, is the quantity of carbonic acid in the atmosphere, which scarcely amounts to one-thousandth part, sufficient for the wants of the whole vegetation on the surface of the earth? Is it possible that the carbon of plants has its origin from the air alone? This question is very easily answered. It is known that a column of air of 2,216.66 lbs. Hessian rests upon every square foot Hessian of the surface of the earth; the diameter of the earth and its superficies are likewise known, so that the whole weight of the atmosphere can be calculated with the utmost exactness. The thousandth part of this is carbonic acid, which contains upwards of twenty seven per cent. of carbon. By this calculation it can be shown that the atmosphere contains 3000 billion lbs. Hessian of carbon; a quantity which amounts to more than the weight of all the plants, and of all the strata of coal and brown coal, which exist upon the earth. This carbon is therefore more than adequate to all the purposes for which it is required. The quantity of carbon contained in sea-water is proportionally still greater.”—p. 21.

Again :—

“The proper, constant, and inexhaustible sources of oxygen gas are the tropics and warm climates, where a sky seldom clouded permits the glowing rays of the sun to shine upon an immeasurably luxuriant vegetation. The temperate and frigid zones, where artificial warmth must replace the deficient heat of the sun, produce, on the contrary, carbonic acid in superabundance, which is expended in the nutrition of the tropical plants. The same stream of air which moves by the revolution of the earth from the equator to the poles, brings to us in its passage from the equator the oxygen generated there, and carries away the carbonic acid formed during our winter.

“Plants thus improve the air by the removal of carbonic acid, and by the restoration of oxygen, which is immediately applied to the use of man and animals. . . . Vegetable culture heightens the salubrity of a country; and a previously healthy country would be rendered quite uninhabitable by the cessation of all cultivation.”—p. 23.



Although the above extracts are much compressed, we trust they will convey to our readers some idea of the cogency and beauty of the arguments by which Professor Liebig has established his propositions. They leave no doubt as to the sublime and perfect arrangements by which much of the economy of nature is maintained ; they point directly, in the words of our author, to "an infinite wisdom, for the unfathomable profundity of which language has no expression." The importance of the conclusions thus established to a scientific system of agriculture is too obvious to require comment.

"How does it happen," asks Professor Liebig, "that the absorption of carbon from the atmosphere by plants is doubted by all botanists and vegetable physiologists, and that by the greater number the purification of the air by means of them is wholly denied ? These doubts have arisen from the action of plants on the air in the absence of light, that is, during the night."—p. 26.

These doubts and difficulties are discussed and dissipated by our author in a most masterly chapter, which, however, we cannot quote at present. He candidly acknowledges that

"The opinion is not new that the carbonic acid of the air serves for the nutriment of plants, and that its carbon is assimilated by them ; it has been admitted, defended, and argued for, by the soundest and most intelligent natural philosophers, namely, by Priestley, Sennebier, De Saussure, and even by Ingenhousz himself. There scarcely exists a theory in natural science in favor of which there are more clear and decisive arguments. How, then, are we to account for its not being received in its full extent by most other physiologists—for its being even disputed by many—and considered by a few as quite refuted ?"—p. 34.

This, Professor Liebig attributes to two causes. First, that most botanists and physiologists have not availed themselves of the assistance of chemistry in their researches, owing to their slender knowledge of that science ; secondly, that those who have experimented, in all good faith, on this very point, have made their researches in a manner totally opposed to all the principles of experimental philosophy. They were utterly unacquainted with the art of experimenting, which, as he justly says, can only be learned in the laboratory. Both accusations are true to a certain extent ; it is certain that if physiologists had availed themselves of chemistry they would have advanced farther ; as also that if certain experimenters had practically learned the art of research, they would never have thought of attaching any importance to the results of such experiments as Prof. Liebig describes ; but we venture to offer a third explanation, namely, that the arguments for the doctrines established by this writer were never till now laid down in a clear and logical manner ; and the having done this entitles him to the same honor as if these doctrines had originated with him. In fact, when the illustrious philosophers whose names are mentioned above, made their

researches, chemistry was not sufficiently advanced to afford the same means of deciding the question as it does now. In the opinion held by our author, which indeed it is the chief object of his work to inculcate, that it is to chemistry we must look for the future improvement of physiology and of agriculture, we cordially concur. The next generation, both of physiologists and of eminent agriculturists, we confidently predict, will be men accomplished in the art of chemical research; and for this we shall be mainly indebted to Prof. Liebig.

Passing over an interesting section on the assimilation of hydrogen by plants, we must briefly allude to that on the source of the *nitrogen* in the vegetable kingdom. This element is highly important, as being an essential part of those vegetable products which serve as food for man and animals. Indeed, Boussingault had proved that the nutritive power of different species of vegetable food is in proportion to the nitrogen they contain.

Without entering into minute details, we may state that Prof. Liebig has shown that all the nitrogen of plants and animals is derived from *ammonia*; and that this ammonia is furnished by the *atmosphere*, from which it is brought to the earth in every shower of rain. Its quantity in the atmosphere is relatively very small, but amply sufficient for all the demands of the animal and vegetable kingdom. Indeed, as all the nitrogen of past generations of plants and animals must, in the process of putrefaction, have been sent into the atmosphere in the form of ammonia, its presence in the air might have been anticipated. It is to Professor Liebig, however, that we owe the experimental proof of the fact. He has shown that "the ammonia contained in rain and snow-water always possessed an offensive smell of perspiration and putrid matters—a fact which leaves no doubt respecting its origin." (p. 76.) From the rain-water it is absorbed into the plants; and our author has shown that, previous to its undergoing those chemical metamorphoses which cause its assimilation, it may be detected in the juices of almost all plants.

Although, in the case of land not manured, all the ammonia is derived from the atmosphere, it is otherwise in those cases where animal manure is employed. One chief use of animal manure is to yield more ammonia than the air can furnish; and for this purpose, those kinds of manure are obviously the best which contain the largest proportion of ammonia or of nitrogen. Hence the high value of liquid manure compared with solid, the former being far richer in nitrogen than the latter:—

"Agriculture differs essentially from the cultivation of forests, inasmuch as its principal object consists in the production of nitrogen in some form capable of assimilation by animals; while the object of forest-culture is confined principally to the production of carbon."—p. 85.

Wheat, for example, is composed of two principles, starch and gluten; of which the latter alone contains nitrogen. Now an increased

supply of nitrogen in the form of ammonia not only increases the number of seeds obtained from one plant, but also the proportion of gluten to starch, in other words the nutritive power, of those seeds. Thus 100 parts of wheat grown on land manured with cow-dung, a manure containing the smallest proportion of nitrogen, afforded only 11.97 parts of gluten; while the same quantity grown on a soil manured with human urine, which is very rich in nitrogen, yielded the largest proportion of gluten yet found, namely, 35.1 per cent.

Professor Liebig, after bringing forward numerous proofs that it is ammonia which yields to plants all their nitrogen, then proceeds to explain the principle on which gypsum, burnt clay, and ferruginous earths act in promoting fertility. All these substances possess the property of absorbing and fixing the ammonia, whether derived from the air or from manure. Many other substances have the same effect; such as powdered charcoal, diluted acids, &c., and some of these will no doubt be employed hereafter. It is easy to see why gypsum, for example, does not equally improve all soils. In some there is already a sufficient quantity either of gypsum, or of some analogous substance, to fix all the ammonia that they receive. If sterile, their sterility must depend on some other cause: for "no conclusion," says the author, "can have a better foundation than this, that it is the ammonia of the atmosphere (where manure is not used) that furnishes nitrogen to plants."

We have already seen that the carbon is furnished by carbonic acid, while water yields the oxygen and hydrogen:—

"Carbonic acid, water, and ammonia, contain the (organic) elements necessary for the support of animals and vegetables. The same substances are the ultimate products of the chemical processes of decay and putrefaction. All the innumerable products, therefore, of vitality resume, after death, the original form from which they sprung. And thus death—the complete dissolution of an existing generation—becomes the source of life for a new one."—pp. 91, 92.

We earnestly recommend this section to our readers as being equally interesting with that on carbon, and argued with at least equal talent. To do it justice, we ought to have copied it entire. But we have shown, we trust, its importance; and we confidently anticipate from it practical applications of immense value to the agriculturist.

"But another question," says our author, "arises. Are the conditions already considered the only ones necessary to the life of vegetables? It will now be shown that they are not."—p. 92.

This leads him to the consideration of the *inorganic* or mineral constituents of plants. And here we have another admirable specimen of the manner in which he handles an obscure and difficult subject. He first points out that all plants contain, although in small quantity, certain mineral substances, often different in different plants, but generally

the same in the same species. Thus, for example, the stems and leaves of all the gramineæ invariably contain silicate of potash, while phosphate of magnesia and ammonia are found in their seeds. He then shows that those alkaline or earthy bases which are found in the ashes of plants in the form of carbonates, existed originally in the plants in the form of salts, that is, combined with vegetable acids which have been destroyed by the combustion. As certain of these vegetable acids are peculiar to certain species, and constantly occur in them, he concludes that they are essential to the development of the species in which they occur; and as they occur in combination with alkaline bases, it is obvious that these bases also are essential to the plants.

In many cases—for example, in wheat—the acids as well as the bases are of mineral origin; and in others, such as opium and cinchona bark, the bases are organic, while the acids are partly mineral and partly vegetable. Further, it appears that one base or acid may, within certain limits, supply the place of another, without injury to the plant; while, in most cases, the absence of the proper mineral base or acid arrests entirely the development of the plant. Thus, opium contains variable proportions of sulphuric and meconic acids; and when there is much of the latter there is always a deficiency of the former. In cinchona bark, quinine and lime are found; and the more lime is present, the less quinine does the bark contain. Again, pine-wood in one soil has been found to contain much lime, little potash, no magnesia; in a different soil, less lime, more potash, and a certain quantity of magnesia; but in both, the power of the bases taken together to neutralize acids was almost exactly equal. Nay, a third specimen, containing potash, soda, lime, and magnesia, was still found to have the same neutralizing power. These curious facts, all taken from the researches of the most accurate observers, but observed without special reference to this point, and consequently beyond all suspicion, lead to the conclusion that each vegetable requires a definite amount of mineral bases to combine with its proper acid or acids; and consequently that these bases have an important function to perform in the economy of the plant. In many cases this function can only be performed by one base and one acid. Thus, in wheat-straw silica is the acid and potash the base; and without these materials, happily present in most soils, wheat cannot thrive. It may be, indeed, that the silica and potash are not combined; the potash might be, and probably is, in part combined in wheat with an organic acid; but the fact is not the less certain, that silica and potash are as essential to the growth of wheat as carbonic acid, water, and ammonia.

We have already said that Professor Liebig deserves the highest praise for his manner of treating this subject, and for the clearness with which he has demonstrated the absolute necessity of the mineral constituents of plants, which have been generally viewed as accidentally present. But he has gone further, and has shown that on this principle are to be explained the good effects of many practices empirically pursued. Nay, he has proved that cow-dung, the most common animal



manure, which, as already mentioned, is very poor in nitrogen, is valuable, not on account of its organic, but its inorganic contents, namely, potash and phosphates. It is not easy to imagine a more unexpected result, one more satisfactorily demonstrated, or one more capable of immediate practical application.

From the section on the inorganic elements of plants we gather the following highly important conclusions. First, that since the carbon and nitrogen of plants are derived from the atmosphere, the causes of fertility must be sought for in the mineral or inorganic elements of the soil. Secondly, that since one plant requires different elements from another, a soil may be fertile for one plant and sterile for another, or *vice versa*; or, finally, fertile for both. Thirdly, that an exact analysis of the ashes of every part of a plant will give us a correct knowledge of those mineral substances which are essential to its development, and which therefore must be present in the soil in which we wish to grow the plant. Fourthly, that a careful analysis of any soil, the composition of the ashes of a certain number of plants being previously known, will teach us at once which of these plants may be advantageously cultivated in that soil, which of them cannot be so cultivated, and how the soil may be rendered capable of producing the latter as well as the former. Lastly, we learn on what the exhaustion of soil depends; on the removal, namely, in the crop, of the mineral elements contained in the plant; for if these be not restored, the soil retains too little for another crop. Hence the use of allowing land to lie fallow; for during fallow, the action of air and moisture extracts a fresh supply of bases from the subjacent rock, and prepares the soil for a new crop.

"The perfect development of a plant, according to this view, is dependent on the presence of alkalies or alkaline earths; when these substances are totally wanting its growth will be arrested; and when they are deficient it must be impeded.

"Let us compare two kinds of tree, the wood of which contains unequal quantities of alkaline bases, and we shall find that one of these grows luxuriantly in several soils on which the others are scarcely able to vegetate. For example, 10,000 parts of oak wood yield 250 parts of ashes, the same quantity of fir wood only 83, of lime wood 500, of rye 440, and of the herb of the potato-plant 1,500.

"Firs and pines find a sufficient quantity of alkalies in granitic and barren sandy soils, in which oats will not grow; and wheat thrives in soils favorable to the lime tree, because the bases which are necessary to bring it to complete maturity are present in sufficient quantity. The accuracy of these conclusions, so highly important to agriculture and to the cultivation of forests, may be proved by the most evident facts.

"All kinds of grasses contain, in the outer parts of their leaves and stalk, a large quantity of silicic acid and potash, in the form of acid silicate of potash. The proportion of this salt does not vary perceptibly in the soil of corn-fields, because it is restored to them as manure in the form of putrefying straw. But this is not the case with a meadow, and hence we never find a luxuriant crop of grass on sandy and calcareous

soils, which contain little potash, evidently because one of the constituents indispensable to the growth of the plants is wanting. Soils formed from basalt, grauwacke, and porphyry are, *ceteris paribus*, the best for meadow land, on account of the quantity of potash which enters into their composition. The potash abstracted by the plants is restored by the annual irrigation. That contained in the soil itself is inexhaustible in comparison with the quantity removed by plants.

"But when we increase the crop of grass in a meadow by means of gypsum, we remove a greater quantity of potash with the hay than can, under the same circumstances, be restored. Hence it happens that after the lapse of several years, the crops of grass on the meadows manured with gypsum diminish, owing to the deficiency of potash. But if the meadow be strewed occasionally with wood-ashes, even with the lixiviated ashes which have been used by soap-boilers, then the grass thrives as luxuriantly as before. The ashes are only a means of restoring the potash.

"A harvest of grain is obtained every thirty or forty years from the soil of the Luneburg-heath, by strewing it with the ashes of the heath-plants which grow on it. These plants, during the long period just mentioned, collect the potash and soda which are conveyed to them by rain water; and it is by means of these alkalies that oats, barley, and rye, to which they are indispensable, are enabled to grow on this sandy heath."—p. 104-106.

In reference to this interesting subject we would mention the following anecdote, for the truth of which we can vouch, having heard it attested by the parties themselves. A distinguished professor of chemistry in Germany, in discussing with the author the question of the use of alkalies, and in particular the necessity of potash for the growth of wheat, mentioned, as unfavorable to that view, the fact that fine crops of wheat were obtained from a purely calcareous soil, lying over limestone, in Hanover. "Then," answered Professor Liebig, "you may rely upon it that the limestone contains potash." His friend took an early opportunity to investigate the matter, and found, to his surprise, that the limestone in question did contain a very notable proportion of potash, a fact previously unknown. He found potash also in other fertile limestones, and in every specimen of clay he examined, even in the purest pipe-clay. We doubt not, therefore, that potash in some form will be found in every soil in which wheat thrives.

Intimately connected with this subject are those of the art of culture, the rotation of crops and manures. We cannot refrain from giving our readers a few illustrations of the results at which Professor Liebig has arrived in regard to the last of these:—

"When it is considered that every constituent of the body of man and animals is derived from plants, and that not a single element is generated by the vital principle, it is evident that all the inorganic constituents of the animal organism must be regarded, in one respect or other, as manures. The earthy residue of the putrefaction of animals must be considered, in a rational system of agriculture, as a powerful manure

for plants, because that which has been abstracted from the soil for a series of years, (in the food of the animals living on it,) must be restored to it, if the land is to be kept in a permanent condition of fertility."—p. 174.

In like manner the author explains that during life that portion of the inorganic constituents of the food which is not assimilated by the animal must be found in its excrements. We have thus two sources of animal manure—the excrements, and the residue left after putrefaction; in other words, the earth of bones.

It is commonly supposed that cow and horse-dung act by virtue of their organic constituents, which on the one hand in decaying yield humus, or a carbonaceous residue, and on the other ammonia. Professor Liebig has shown that, admitting the value of humus, (which he has proved elsewhere to consist in its yielding a slow and constant supply of carbonic acid, partly to the air, partly to the roots of plants,) the quantity of humus yielded by these manures is quite trifling compared to the amount of carbon collected in the crop—and we have already seen that horse and cow-dung contain very little nitrogen. But on analyzing these manures they are found to contain another element, namely, mineral and saline substances.

"4000 lbs. of fresh horse-dung, or 1000 lbs. of dry dung, yield from 100 to 270 lbs. of salts and other inorganic substances. These are evidently the substances to which our attention should be directed; for they are the same which formed the component parts of the hay, straw, and oats, with which the horse was fed. Their principal constituents are—the phosphates of lime and magnesia, carbonate of lime and silicate of potash: the first three preponderated in the corn, the latter in the hay. Thus in 1000 lbs. of dried horse-dung we present to a field the inorganic substances contained in 6000 lbs. of hay, or 8,300 lbs. of oats. This is sufficient to supply one crop and a half of wheat with potash and phosphates. . . . The peculiar action, then, of the solid excrements of animals is limited to their inorganic constituents, which restore to a soil that which is removed in the form of hay or straw, roots or grain."—pp. 179, 181.

It is plain that, even when the dung of a farm is carefully applied with the straw as a manure, a certain loss is sustained in the potash and phosphates which are carried away in the corn and cattle annually sold. This loss is partly compensated by the annual disintegration of the subjacent strata by the weather; partly, in a large farm, by the dung of animals fed on meadow-hay grown without manure: in Germany it is also partly made up by the use of wood-ashes, containing potash and phosphates, as manure; and the ultimate loss is spread over so large a surface as to become nearly inappreciable.

"We could keep our fields in a constant state of fertility by replacing every year as much as we remove from them in the form of produce; but

an increase of fertility can only be obtained when we add more to them than we take away.

"It will readily be inferred that for animal manures other substances, containing their essential ingredients, may be substituted. In Flanders, the yearly loss of the necessary matters in the soil is completely restored by covering the fields with ashes of wood or bones, which may or may not have been lixivated, and of which the greater part consists of the phosphates of lime and magnesia. The great importance of manuring with ashes has long been recognised by agriculturists as the result of experience. So great a value, indeed, is attached to this material in the vicinity of Marburg and in the Wetterau, that it is transported as a manure from a distance of eighteen to twenty-four miles."—p. 182.

Bone-manure, the effects of which have excited so much astonishment, acts on the very same principle. Every particle of the bones of cattle, like all the other parts of their bodies, has been derived from the grass on which they fed, and consequently from the soil on which the grass grew; and hence, in manuring a field with bone-earth, we are merely restoring what had been removed from it during a much longer period in the form of grass, hay, corn, or turnips. Had the true principle of manures been known, the introduction of bone-earth had not been left for the nineteenth century. Even now, of those who use it, how few have the slightest conception of the reason why it is a manure at all? 8 lbs. of bones contain as much phosphate of lime as 1000 lbs. of hay or wheat straw; and 2 lbs. contain as much as 1000 lbs. of the grain of wheat or oats: 40 lbs. of bone-dust, added to an acre of land, is sufficient to supply with phosphates three crops of wheat, clover, potatoes, turnips, &c.

Mr. Liebig recommends (p. 184) to powder the bones, to mix them with half their weight of oil of vitrol, previously diluted with three or four parts of water; and after maceration for some time, to add 100 parts of water, and sprinkle this mixture over the field before the plough. By this means the phosphates are brought into a soluble state, and the free acids are instantly neutralized by the alkaline bases of the soil, producing neutral salts in a state of fine division, eminently favorable to absorption. He has ascertained by experiment on a soil formed of *grauwacke*, that this treatment is perfectly safe and highly successful, both for corn and for garden vegetables.

It is here that chemistry offers so many resources to the agriculturist. "In the manufactories of glue from bones," says our author, "many hundred tons of a solution of bone-earth in muriatic acid are yearly thrown away as useless." As this solution much resembles that above mentioned, he recommends that it should be preserved, and tried as a substitute for the bones. The muriatic acid would unite with the lime of the soil and form a salt, which is already known to act favorably on soils, most probably by the fixation of ammonia, as gypsum does. There is here, therefore, a double prospect of usefulness.

"It is of the utmost importance to the agriculturist, that he should not



deceive himself respecting the causes which produce the effects just mentioned as the peculiar action of certain substances. It is known that they possess a favorable influence on vegetation; and it is likewise certain that the cause of this must be that they contain a body or bodies which, independently of the influence they exert by virtue of their form, porosity, and capability of attracting and retaining moisture, also assist in maintaining the vital processes in plants. If it be treated as an unfathomable mystery, if the veil of Isis be thrown over it, the nature of the aid they afford will never be known."—p. 186.

"It must be admitted as a principle of agriculture, that those substances which have been removed from a soil must be completely restored to it; and whether this restoration be effected by means of dung, ashes, or bones, is in a great measure a matter of indifference. A time will come when fields will be manured with a solution of silicate of potash, with the ashes of burnt straw, and with salts of phosphoric acid, prepared in chemical manufactories, exactly as at present medicines are prepared for the cure of ague and goitre."—p. 187.

We have great satisfaction in mentioning, as a note to the preceding paragraph, that the Professor has been informed, since the publication of his book, that the ashes of straw have long been used in certain districts of Germany as the best manure for wheat. But those who used them had no idea of the cause of their superior excellence as a manure. They acted empirically; and we could not desire a better proof of the great truth, that every discovery, legitimately inferred from observed facts, will sooner or later be found to coincide with the best practice, and to explain it. We may add that we have seen letters from German agriculturists, cordially appreciating the principles developed in Liebig's work, as supplying them with that which they had earnestly sought for during their lives, but had long ceased to hope for; having found in the works of physiologists nothing but contradictory facts and baseless theories.

With reference to the subject of manures, there are one or two principles which appear to us to flow naturally from Mr. Liebig's researches, and which are worthy of all attention from agriculturists. The first is, that since every plant extracts from the soil, and retains in its substance, only such inorganic matters as are essential to its growth, the very best manure for a plant must be the plant itself, in the form of straw, or even in that of ashes. We have seen how the ashes of wheat straw are, and must be, the best manure for wheat; but the principle must apply universally. Potatoes, for example, will be best manured with the ashes of potato-plants, which are singularly rich in phosphate of magnesia, the characteristic salt of the potatoe. Of course, in this case, as in all others, any other ashes containing the same salt, or any other source of it, may be employed with equal advantage. We have had the pleasure of seeing the result of the use of pure phosphate of magnesia as a manure for potatoes; and we could not previously have imagined such astonishing crops as we then beheld. Now chemistry can easily produce this salt in sufficient quantities and at a low price,

when it shall be wanted. Our strata of magnesian limestone, which alone is generally hurtful to plants, will thus furnish us with the means of adding to our crops of potatoes almost without expense.

Again, when we reflect on the vast importance of nitrogen as an ingredient of grain, and on the fact that cow and horse dung contain very little of that element, we must see how essential it is not to waste any portion of liquid manure, the proper source of that portion of nitrogen which must be added to what is derived from the atmosphere before we can obtain rich crops of grain. But a still more important source of nitrogen is in the contents of our common sewers, which, from a barbarous ignorance, are commonly thrown into the sea.

"When it is considered that with every pound of ammonia which evaporates a loss of 60 lbs. of corn is sustained, and that with every pound of urine a pound of wheat might be produced, the indifference with which these matters are regarded is quite incomprehensible."

"The powerful effects of urine as a manure are well known in Flanders but it is considered invaluable by the Chinese, who are the oldest agricultural people we know. Indeed so much importance is attached to it by these people, that laws of the state forbid that any should be thrown away, and reservoirs are placed in every house, in which such matters are collected with the greatest care. No other kind of manure is used for their corn-fields.

"China is the birthplace of the experimental art: the incessant striving after experiments conducted the Chinese a thousand years since to discoveries which have been the envy and admiration of Europeans for centuries—especially in regard to dyeing and painting, and to the manufacture of porcelain, silk, and colors for painters. These we were long unable to imitate; and yet they were discovered by them without the aid of scientific principles: for in the books of the Chinese we find recipes and directions for use, but never explanations of processes.

"Half a century sufficed to Europeans, not only to equal, but to surpass the Chinese in the arts and manufactures; and this was owing merely to the application of correct principles deduced from the study of chemistry. But how infinitely inferior is the agriculture of Europe to that of China! The latter is the most perfect in the world; and there, where the climate in the most fertile districts differs little from the European, very little value is attached to the (solid) excrements of animals."

Were the contents of our common sewers properly treated—mixed, for example, with ashes containing phosphates and with a slight excess of diluted acids, and then dried up so as to get rid of the water they contain, without permitting the escape of ammonia—they might readily be obtained free from all offensive odour, and in a form admitting of transportation to any distance. Such a mixture would surpass all manures hitherto tried, as it would contain precisely what is required to yield the richest crops of grain. By availing ourselves in such matters of the means offered by chemistry, we feel satisfied that in less than another half century we should leave far behind the empirical agriculture of the Chinese. Some such attempts have been made on the con

tinent : and although, from ignorance on the part of the manufacturer, a great part, nay, in some establishments, the whole of the ammonia is expelled and lost in the process of preparation, yet the manure so prepared, acting by its inorganic constituents alone, has produced amazing effects.

Our readers, we trust, are by this time convinced that the principles of rational agriculture are within the domain of science, and that from science alone, when called in to aid the zealous agriculturist, can we hope for real and permanent improvement. In the present work, Mr. Liebig has pointed out the path to be pursued, and has amply vindicated the claim of science to be considered the best guide, by correcting the erroneous views hitherto prevailing of the sources whence plants derive their nourishment, by developing the true causes of fertility in soils, and finally, by establishing on a firm basis the true doctrine of manures. We do not, any more than the author himself, consider his work in the light of a complete treatise on the chemistry of agriculture ; we look on it merely as an example of the proper method to be followed in producing such a work, and in this point of view we hold Dr. Liebig to be entitled to the gratitude of mankind.

It is satisfactory to know that, of this very valuable work, the second English edition is already in the press, to be published at a cheaper rate ; that two editions have been exhausted in French ; that a third German edition has lately appeared, and that it has been reprinted in America. The author received the thanks of the British Association for his work ; and Dr. Daubeny, the distinguished professor of agriculture at Oxford, who had undertaken to report on agricultural chemistry to the late meeting of the Association at Davenport, candidly acknowledged that he had nothing material to add to Professor Liebig's report, to which he referred. Professor Johnston of Durham has also afforded the best proof of the high opinion he entertains of it, by giving a valuable and interesting course of lectures on the subject, in which he has embodied and strongly urged on the attention of our northern agriculturists the principles established by Professor Liebig.

The translation before us, although generally accurate, is far from being elegant, and is occasionally obscure. In a few instances there are serious errors, which we believe to be attributable to haste in printing, as the volume was with difficulty got ready in time for the Glasgow meeting of the Association. We have no doubt that the second edition, now in the press, will be free from such blemishes. It is, however, a difficult task to give in a translation the true character of Professor Liebig's German style, ardent and energetic, often abrupt, but singularly forcible and impressive.

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## ARTICLE VII.

POLITICAL RETROSPECT : ENGLAND, FROM 1830 TO 1841.

## INTRODUCTORY NOTE.

The following article in the Westminster Review, is headed with the titles of several recent publications respecting the period to which it refers. Its introductory pages describe the British Empire, as occupying a prouder position than that of ancient Rome. On its territorial possessions the sun never sets, and its subjects are 200,000,000 of human beings, while its counsels and measures affect to a fearful extent, the destinies of the whole human race. Of this immense structure, the writer predicts, in glowing language, an approaching decline and fall. But these descriptions and forebodings are too familiar to our readers to demand a place in our selections. We accordingly omit them, and proceed to that portion of the article whose subject is properly indicated by its running title, as given above.

To those who are not already familiar with the subject, the following historical sketch will convey important instruction. It traces, step by step, the causes which resulted in the late change of administration, and will place before American readers, more concisely than we have seen it done elsewhere, the means of forming a correct judgment of the present position and prospects of the British Government.—SR. ED.

From the Westminster Review, April, 1842.

NOT with the charity which would cover the failings of common men should the acts of statesmen be judged. "We have all done those things which we ought not to have done;" but the faults of statesmen, whether of omission or commission, are attended with consequences infinitely more fearful than those of individuals moving in a narrow sphere.

And yet in our brief historical sketch of the history of the late Cabinet, and that of the Reform Bill, we would make a liberal allowance for whatever circumstances human prudence could not have foreseen or controlled. We approach the subject more in sorrow than in anger. We admit the paucity of men among Reformers in favor of whom the late Ministers might have been advantageously displaced; yet it is not by shutting our eyes to their errors in the spirit of blind partisans that the experience of the past can become a lesson for the future. We hear it continually said that the late Ministers were, after all, in advance of the age; that their fall was owing to the ignorant impatience of the ultra-Reformers. Some even have ventured to assert that, but for the Poor Law Bill, and the talk made about national education, the Whigs would now be in office. We would inquire into the foundation of this opinion, and trace the true causes of a result so unexpected by the public as the complete restoration of Tory ascendancy after an interval of



only nine years from the date of the Reform Bill ;—the measure which was to destroy forever the hopes of Conservatism.

We take a retrospective glance over a most eventful period. With the exile of Napoleon to St. Helena, in 1815, ceased the wars which had sprung out of the first French Revolution. A long season of comparative political inaction succeeded. For fifteen years the world jogged on quietly, industry following its peaceful course, and the people excited by little of greater moment than public meetings in favor of Reform,—a yeomanry charge at Manchester upon an unarmed multitude, and an abortive attempt of the Liverpool Ministry to obtain a Royal divorce. George the Fourth could not penetrate the future, or he might have saved himself much needless trouble and mortification. In less than one year after the failure of his divorce bill, died its object, Queen Caroline (August 7th, 1821), and on the 7th of June, 1830, its author was no more.

The funeral of George the Fourth took place on the fifteenth of the following month—a day not to be forgotten, for the way in which it was observed illustrated the state of public opinion. Two royal funerals will long be held in remembrance. The first that of Princess Charlotte, (November 18, 1817)—a day of sincere and universal mourning ; sadness on every brow, sorrow in every heart. All business was then suspended ; not only in London, but in every town in England ; the churches and chapels were opened, and never had they been known so crowded. On the funeral of George the Fourth, the recommendation of the Lord Mayor that tradesmen should close their shops, was generally obeyed, but not from regret for the departed monarch. The day was fine, and the opportunity of a holiday was eagerly embraced. Passing over the bridges on the morning of that day, we stopped to look at the steamboats starting for Richmond. Not a spot on their decks was visible from the dense mass by which they were covered. Hundreds were hailing the vessels from the shore, but not another soul could be received on board. In St. Paul's church-yard it was amusing to witness the blank disappointment of numerous groups hurrying to the short stages and finding every place taken. The whole population of London appeared setting out upon an excursion of pleasure. The churches were empty ; their congregations had fled to Blackheath or Greenwich park. It seemed a day of rejoicing, and why should the voice of lamentation have been heard ? Why should sorrow have been shown by the people for one who had felt no sympathy for them, and who, on many occasions, had proved himself an enemy rather than a friend ; one who, in his day, had respected neither the liberty of the press nor the right of petition ; who had resisted till even Wellington could resist no longer, the measure of Catholic emancipation ; whose private character, as a husband or father was held in abhorrence ; and who during the last years of his life, had secluded himself from public observation to pursue his own pleasures, or obtain what solace he might in the society of hollow friends for his increasing infirmities. There was reason for hope, but no cause for sorrow. A vain, self-engrossed

old man had, at last, found his true level in "dust to dust, and ashes to ashes;"—one more obstacle to the changes essential to progress was removed, and a better future appeared in prospect.\*

The bell of St. Paul's, when it tolled to announce that George the Fourth was gathered to his fathers, startled Europe from its repose. Almost before its tones had ceased to vibrate on the ear, a shock came as of an earthquake, and the dynasty of the elder branch of the Bourbons was seen to pass away like a dream. Ten days after the remains of the English monarch had been interred at Windsor, the celebrated ordinances of the Polignac Ministry appeared in the "*Moniteur*." The revolution of July followed, and Charles the Tenth was an exile in England. A ship which, but a few days before, had sailed to join the Algerine expedition, returned with news from the fleet. As it neared the port of Toulon its crew distrusted the evidence of their senses; the tri-color was floating where they had left the flag of the white lily. All was changed.

Not only did the suddenness of the event take the courts of Europe by surprise, but the brave spirit shown by the French people in a cause which few could deny to be just, and their moderation in the moment of victory, won for them the respect even of crowned potentates. The Wellington administration yielded to a generous impulse, and hastened to recognize Louis Phillippe, with his new title of King, not of France, but of the French.

By the people everywhere the events of the three days were hailed with an enthusiasm that knew no bounds. An impulse had been given to the progress of great public or national questions, which it was seen nothing could then resist. Its results were immediately manifested in the separation of Holland and Belgium, the revolutions in Poland, Spain, and Switzerland, and in the modifications introduced into the constitutions of various German States. In England its fruit was the Reform Bill; and perhaps the most remarkable instance of short-sightedness in the career of the Duke of Wellington, is the fact that he failed to perceive that the circumstances of the time had rendered imperative some such change as was involved in the principle of that measure.

In the preceding session, Mr. Tennyson's motion for transferring the franchise from East Retford to Birmingham had been defeated by Government, and the Duke could not see that the revolution of July had either strengthened the demand for reform, or weakened his own means of resisting it. To this blindness, more than to any other cause, may be attributed the long exclusion of his party from office. A defeat would perhaps have been unavoidable, but the Wellington administration seemed to court destruction. A change far less extensive than that which was afterwards effected, would have satisfied that timid but

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\* The extensive metropolitan improvements commenced in the reign of George the Fourth are, perhaps, the solitary public benefit that can be distinctly traced to the personal influence of that monarch.

influential section of moderate men which had joined the party of the people. The Cabinet ventured to encounter their open hostility, and even provoked it to the utmost.

No sooner had the new Parliament of William IV. assembled, than the Duke of Wellington took the first opportunity of saying in his place in the House, (see his speech on the address, Nov. 1, 1830,) that—

"He had never heard or read of any measure up to the present moment which could, in any degree, satisfy his mind that the representation could be improved, or be rendered more satisfactory to the country at large, than at the present moment.

"It would not be an easy task to form, for any country, such a legislature as we now possessed, for the nature of man was incapable of attaining such excellence at once.

"He was not only not prepared to bring forward any measure of this nature, but he would at once declare that, as far as he was concerned, as long as he held any situation in the Government of the country, he should always feel it his duty to resist such measures when proposed by others."—*Hansard*, vol. i, p. 53.

A week after this memorable declaration, so unpopular had the Ministry become, that a well-founded apprehension of a general riot induced the Ministry to advise the King to break his engagement with the Lord Mayor to dine in the city on the 9th of November. In another week the Ministry resigned, being defeated in the House of Commons, on the question of the civil list, by a majority of 29.

Earl Grey succeeded to office, and a Cabinet was formed on the basis of Parliamentary Reform, as one of the first measures to be proposed by the new Government.

The pledge given was nobly, in intention at least, redeemed. It would not be justice merely to say that public expectation, excited to the utmost, was not disappointed by the measure of Reform proposed. Here the Ministry indeed went beyond the public, and not even the most sanguine of their supporters had predicted a measure conceived in so just and generous a spirit as the plan of Parliamentary Reform which was introduced by Lord John Russell to the House of Commons, on the 1st of March, 1831. Never did a speech produce such an electrical effect through the country. We remember the emphatic "Thank God!" of a clergyman, the head of the denomination to which he belongs, when a second edition of the "Globe," detailing the outlines of the measure, had been procured and read to a circle of friends. That ejaculation of heartfelt gratitude only expressed the sentiment of every man in England animated by a true spirit of religion and philanthropy. Sixty rotten boroughs to be disfranchised! Sixty others to return in future but one member! Representatives to be given to all the large towns! Every ten-pound householder to have a vote! Such were the general features of the plan; and when they became universally known the following day through the press, the whole people gave themselves up to an intoxication of joy. Three nights of public illu-

minations succeeded; the only illuminations we have ever seen, in which the middle and working classes spontaneously and universally adopted this mode of expressing their approbation of the conduct of their rulers. The public offices, the mansions of the aristocracy, the fashionable clubs, were dark; but every street in the commercial part of London and the suburbs, every lane of humble tenements, both banks of the river, from Chelsea to Greenwich, were a blaze of light; and the example of public rejoicing set by the metropolis was followed not only by the towns, but in the villages of the most obscure hamlets of the United Kingdom.

This great public demonstration of interest in the "Bill, the whole Bill, and nothing but the Bill," intended to strengthen the party of Reform, and essential, perhaps, to the success of the measure under the circumstances in which it was introduced, yet tended somewhat to defeat its own object, and probably led to many of the mistakes which the same Ministers afterwards committed. It produced a generally exaggerated impression of the importance of the measure, and of the sweeping character of the changes effected, which a cooler examination would have shown to have been more apparent than real, and determined both the Grey and the Melbourne Ministry to resist all further movement in the same direction. The Conservatives were alarmed at the strides of democracy, and so also appeared to be the Whigs. It appeared evident that a party in the Cabinet thought they had gone too far, and the public saw with surprise that the promoters of the Bill suddenly seemed to lack the vigor and resolution they had at first displayed. What a satire is it upon the fears which were then entertained, and upon the sagacity of statesmen, that the measure which was considered the most Radical and destructive in its character ever propounded within the walls of Parliament, finally passed an unreformed House of Commons by a majority of 109, on its third reading,\* (March 22, 1832,) while the result of that very Bill, in the fourth reformed Parliament, is a majority of 91 in favor of a Conservative Government.

Fifteen months of wearisome discussion, of alternate triumph and defeat, were consumed before the Reform Bill, or rather a second Bill, a bad copy of the first, mutilated in its most important features, was carried through the Lords, and received (June 7, 1832,) the Royal assent. We will not stop to deplore the alterations made in the passage of the Bill through the House, or to point out the difference between the original Bill of Lord John Russell and that which ultimately became the law. The clause introduced by the present Duke of Buckingham, who destroyed the independence of the counties by his tenant-at-will voters; the complicated character of the registration clauses; the wanton, and almost criminal concession of the rights claimed by the

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\* This was after the dissolution;—but a majority of one was found on the second reading of the first Bill, even in the Parliament of the Wellington administration, before an appeal had been made to the country.



old freemen and scot and lot voters ; these, it is now seen, were all most mischievous and fatal errors, but were not, in our estimation, the most serious faults of that measure. It had one defect so broad and glaring, that posterity will look back in astonishment at the enthusiasm with which the measure was received, and will wonder at the statesmen who could propose to themselves the task of renovating a constitution worthy of a free people, and yet give no better security for their rights than the Bill once, but no longer called "England's New Magna Charta."

The Reform Bill made no provision for establishing any fixed proportion between the number of representatives and the number of constituents.

The very principle which, in any rational plan of representative government, must form the foundation of the whole, was entirely neglected. In the American constitution the rule followed is, that the representatives of a state shall be in the proportion of one to every forty thousand inhabitants. This proportion is adjusted every ten years, when a new census is taken. The framers of the Reform Bill confounded the representation of the people with the representation of places. They gave, indeed, members to cities, where a large population had never enjoyed the franchise, but in many instances only in the same proportion in which members were given to petty villages and market towns. No distinction was made between Manchester, with 8,000 electors, and Thetford, with 160 ; Liverpool, with 12,000 electors, and Chippenham, with 217.

It is said that Lord Durham, to whom Earl Grey entrusted the initiative of the Bill, originally contemplated a much wiser measure ; one by which the number of members of the House of Commons would have been greatly reduced, and which would have given to the elector the privilege so precious to the clubs of the aristocracy—the protection of the ballot. Still the measure would have had the vice of the old system—that of representing places merely, and not the people, nor the property of the people ; as if it had been sufficient to make a certain number of dots, at equi-distances, on the map of the United Kingdom, and to call that a just system of representation which would give a member of Parliament to every dot.

No proposition for equalizing the representation, in reference to either the property or the numbers of the population, appears to have been entertained by the Reform Cabinet. No clause was even prepared to the effect that every five, ten, or fifteen thousand electors should return a representative, or one equally indispensable,—that no member should be returned to Parliament by a constituency of less than two thousand voters.

These extraordinary omissions, and the concessions, which cannot be justified, nor even satisfactorily accounted for, on the plea of expediency, show that the rationale of representation was a subject the first statesmen in England had but seldom studied. We may lament this, and forgive the unfitness for which there was no help, in grateful appre-

ciation of honesty of intention ; but what terms of reprehension would be sufficiently emphatic to condemn the subsequent conduct of men who took their stand upon the Reform Bill as a final measure, proclaiming it practically the wisest, completest, best, Reformers of the present generation could ever hope, or ought perhaps to desire to see carried into effect, and refusing until the last session of their existence, when the reins of power were slipping from their hands, all amendment of any one of its provisions ?

The population of Great Britain and Ireland is now 27 millions, and the constituency embraces about a sixth of the total number of males above 21 years of age. The registration returns for 1841 state the total number of electors at 994,731, a number from which a large deduction should be made for a plurality of votes, the majority of freeholders having at least two votes, one for a borough and one for the county. But the limited extent of the constituency does not strike the attention so much as the curious fact of a minority of electors returning the majority of representatives.

*A sixth portion of the constituency of the United Kingdom returns more than one-half (a clear majority) of the members of the House of Commons.*

While the total constituency of the United Kingdom is 994,731 for the whole 658 members, 341 out of the number represent only a constituency of 164,810. Was ever a scheme of representation so cunningly devised to defeat its apparent object ?

Eighty-eight members returned by constituencies under 400 ! How cheap must the judgment of the country have been held, what a poverty of intellect must have been supposed to prevail, when the public were gravely told that the Reform Bill had brought the representation into a state with which the people should rest satisfied ; and when every Reformer who insisted upon amendments essential to the spirit of the measure, was denounced as a discontented advocate of organic changes equally uncalled for and impracticable.

We would not undervalue the benefits conferred by the Reform Bill on the large towns, nor do we consider that the present existence of a Conservative majority is by any means to be taken as a proof that the Bill was wholly a failure ; but we assert an opinion long weighed and deliberately formed, that in the instance of the above numerous small constituencies, the Reform Bill introduced demoralizing influences infinitely greater than any which prevailed under the old system of pocket boroughs.

When the franchise was entirely nominal, and the electors only some five or twenty dependents of a great proprietor, corruptions was unnecessary, and was not therefore employed. An election was a matter of quiet family arrangement. In many of the Cornish boroughs, for example, contests were unknown ; and the industry of the inhabitants of numerous villages and small market towns was not diverted from its peaceful channels by any change of men or parties. The Reform Bill gave them the semblance of an independence, at once delusive and

fatal. The number of electors was increased to an extent sufficient to encourage bribery, not to render it unavailing. Honesty, industry, temperance, self-respect, are therefore no longer to be found in the same abodes; and if a demon had visited the earth with a scourge, it could not have produced greater moral degradation, and the misery resulting from it, than that which the Reform Bill has too often brought home to the humble domestic hearth.

The doctrine of finality, however, laid down by the Reform Cabinet, is not so inexplicable as it at first appears, and admits of some apology. One great object of the Bill was to give ascendancy to the Liberal party, and this seemed to have been accomplished. Practical men have always the advantage of theorists when they can say, "See how well the system works!" And what could work better for the Ministry, and as they supposed, for the people, than a scheme of representation which seemed destined, judging from the result of the first election in 1832, to secure office to the framers of the Reform Bill for the remainder of their lives? Never had the Conservative party in the House been so thoroughly prostrated. To the first Reform Parliament there were returned—

Liberals	-	-	-	-	-	471
Conservatives	-	-	-	-	-	187
						<hr/>
Majority for Ministers	-	-	-	-	-	284

Human nature would have been very different from what it is, had the Reform Ministers not been content with a measure which had led to so flattering a result. True it was that Harwich, with its 214 electors (now but 181) returned as many members as the West Riding of Yorkshire with 20,000 voters; but then both Harwich and the West Riding of Yorkshire returned at the time friends of Ministers, and what more could be desired? Besides, it was added, the country had gone through a convulsion almost amounting to a revolution, and why were there to be further struggles to strengthen a party which seemed already stronger than strong enough? A great victory had been won: why not enjoy its fruits? Few, if any, in the Cabinet, appeared to be sensible that the advantages gained had not been secured, or to be able to foresee that the enemy, though completely routed, might soon rally; and if the most common precautions were neglected, would ultimately drive their conquerors from the field.

Now that the veil of the then future has been removed, how palpable appears the self-delusion which prevailed. All parties had exaggerated the effects of the Reform Bill, but the Conservatives most of all. A panic had seized them, and blinded by their fears, the hustings was abandoned to their opponents. It was not long before the leaders of this party began to perceive that what the Reform Bill had taken away with the one hand it had given back with the other, and to understand the advantages to be seized in their new position. Availing

themselves of these at the next election in 1835, the Conservatives raised their numbers in the House from 187 to 275 ; at the election in 1837, to 314 ; in 1841, to 369 ; and the opportunity has now been lost, for how long a period we know not, perhaps for a quarter of a century, of making effective improvements in our political institutions.

Other causes than the defects of the Reform Bill contributed undoubtedly to bring about the final triumph of the Conservative party ; and it would be a great error to attribute wholly to intimidation or corruption what may, in part, at least, be traced to the gradual alienation of a large body of former ministerial supporters. How that alienation arose, first affecting the more ardent reformers, and gradually extending to that inert mass of electors belonging strictly to no party, it will not be difficult to discover.

The universal excitement occasioned by the Reform Bill was founded upon expectations of benefits to arise from it, in many cases of a wild and extravagant character, but in others originating in a just and sober view of what a Liberal Government might effect for the popular good. The Reform Bill was to be the precursor of measures which would render justice accessible to the poor as well as to the rich ; which would encourage industry, extend commerce, and cheapen the necessities of life ;—measures which would destroy the abuses in the Church, and protect to the fullest extent the rights of conscience ; which would extend to the poorest child in the kingdom the blessings of education, and restore to the people the old right of self-government in their local affairs ;—measures which would diminish the public expenditure, economise, and yet render more productive, the resources of the state. In return for an implied pledge to effect these objects, the people gave to the Reform Cabinet a degree of support which no former Ministry had ever received. Earl Grey, as we have seen, had a majority of 254 in the House of Commons. The opposition appeared all but annihilated. Out of the House the old forces of corruption, panic-struck, expected the extermination which seemed inevitable. It was a moment when the most extensive measures of administrative improvement could not have failed of success. The country expected and would have welcomed them. A golden opportunity never, perhaps, to be recovered. Alas ! how was it thrown away !

To the astonishment of Reformers, the first Bill introduced by Earl Grey in the House of Lords was a measure, not for extending the liberties of the subject, or further securing the rights of the people by law, but one authorising the Lord Lieutenant to proclaim martial law in any district in Ireland he might consider in a disturbed state !

The assumed ground of necessity for this measure (admitted to be unconstitutional), and which excited the utmost indignation among the Irish members, was the fact that 9,000 crimes, from murder and homicide to common cases of assault, theft, and burglary, had been committed in Ireland in the preceding year. With a population of eight millions in ignorance and poverty, this number of offences (dispassionately considered) was not in itself alarming. More accurate returns,



since furnished by the prison inspectors, swell the number for 1840 to 23,000, including not less than 6,045 cases of riot, breach of peace, and forcible rescue; but we do not now hear of any attempt to cure the evil by martial law. The Bill was hurried through both Houses with unprecedented haste, the Conservatives supporting it to a man, and it became the first public measure of the Reformed Parliament!

It was soon seen to be a mistake. It embittered the feelings of the Irish,—it could do nothing more. It was merely legalising the theory of that which had long been familiar to Ireland in practice. For centuries martial law, or something closely resembling it, had been the only law of Ireland. Law as a protection, a security for industry, was unknown, or known only to the Roman Catholic population as the exclusive privilege of Protestant ascendancy. The disturbances in Ireland were almost wholly agrarian; and what was really required was an honest and fearless inquiry into their origin—an inquiry which would have led to an adjustment of the claims of ejected tenants, involving rights derived from the customary tenure on which their lands had been held—rights said to have been violated by the great landlords in laws made for their own benefit. Such an inquiry should have been accompanied by measures for the settlement of tithe, the equal administration of justice between Catholic and Protestant, and the education of the people;—measures all deferred to a more convenient season.

The Irish Coercion Bill showed a distrust in the moral agencies which ought to be the instruments of every government, but above all of one professing the principles of Reform. This was the same fault, but in a milder form, committed by the leaders of the first French Revolution; the Reign of Terror, they said, must precede that of universal peace. Was such a Bill a worthy pledge of awakening sympathy for a long oppressed and injured people? No other was given. They asked for bread, and received a stone.

And yet one other there was, if a Bill can be justly characterized as a pledge of intention to do justice to Ireland, by which a little finger was laid upon the Irish Church, but with a weight so gentle, that the plethoric patient was scarcely conscious of the pressure, or the public of any relief from the burden it had endured. First fruits were abolished, and the number of Irish bishops somewhat reduced; but Mr. Robinson's motion was refused for an equitable property tax as a substitute for the indirect taxes which press upon industry; Mr. Roebuck's motion for national education was opposed on the ground that Government interference was not required, and would do harm; in like manner were refused the abolition of flogging in the army and the impressment of seamen, the repeal of the taxes on knowledge, various amendments proposed in the registration clauses of the Reform Bill, and vote by ballot.

The most important act of the session was that of Negro Emancipation, introduced by Lord Stanley; an ill-digested measure, and, as the event has proved, unnecessarily costly, but yet a measure worthy of a great nation, and upon which, if fifty millions instead of twenty had been expended, the country would never look back with regret.

The two other important measures of the session were the renewal of the Bank of England charter and that of the East India Company, when the opportunity was taken of throwing open the trade to China and the East Indies. These were not, however, party questions ; and a Conservative Government, in renewing the charters, would probably have insisted upon the same terms which were enforced by a Reform administration.

Some useful reforms were proposed, but allowed to drop ; and the little zeal and energy displayed in their support by the Cabinet as a body (although individuals were not wanting in their duty), gave but a feeble promise of their future realization. It was an ill omen that a Minister, more essential to the time, perhaps, than any other, the Earl of Durham, quietly withdrew, but without any public expression of disagreement with the policy of his colleagues.

The second session of the Reformed Parliament was distinguished by a measure which, had it been carried out in its integrity, by a Government not halting between two opinions, and giving effect to neither, would have been the greatest improvement of the age. The Poor-Law Amendment Bill, to which we allude, was not, however, allowed, in its practical operation, to be the means of introducing any uniform system of relief throughout the country, nor was its machinery made as useful as it might have been rendered in connexion with more popular objects of local government. The bill originated with men to whom the powers it conferred were not entrusted, although necessarily, from its authorship, responsible to public opinion for every blunder committed in the name of the new law. The principle of the measure was one for which the Reform Cabinet can claim no exclusive credit. It was supported by both sides of the House.

The Irish Coercion Bill, again introduced, became, this time, the rock on which the first Reform Cabinet suffered shipwreck. It was determined to renew the Bill for another year, but Lord Althorp, finding that the Lord Lieutenant of Ireland was of opinion that he could carry on the government without the clauses prohibiting public meetings, resigned rather than attempt, as leader of the House of Commons, to press those clauses. This led to the resignation of Earl Grey, and the reconstruction of the Cabinet ;—Lord Althorp returning to office, and Lord Melbourne taking the place of Earl Grey.

A new Coercion Bill, in a milder form, occupied the remaining portion of the session.

In November of the same year (1834) William the Fourth, yearning after his old friends, the Duke of Wellington and Sir Robert Peel, dismissed his Ministers with little ceremony. The removal of Lord Althorp to the House of Lords by the death of his father, Earl Spencer, through which it became necessary that a new Chancellor of the Exchequer should be appointed, was the only pretext.

The third session opened after a dissolution and a general election, at which every effort had been made to obtain a majority for Sir Robert Peel, but without success. The first vote of the House, on the ques-

tion of the speaker\* (Feb. 9, 1835), was decisive, though the resignation of the Conservative Cabinet did not follow till the 8th of April.

The immediate occasion, it will be remembered, was a discussion upon the Irish Tithe Bill, introduced by Sir Robert Peel, upon which a clause was moved by Lord John Russel, and carried by a majority of twenty-five, to the following effect :—

“That any surplus of the revenues of the Irish Church, not required for the spiritual care of its members, should be applied to the general education of all classes of the people without religious distinction.”

A second resolution, confirming the same principle, was carried, on the 7th of April, by a majority of twenty-seven. It declared that

“No measure upon the subject of tithes in Ireland can lead to a satisfactory and final adjustment, which does not embody the principle contained in the foregoing resolution.”

The success of these resolutions re-opened the doors of the Cabinet to Lord Melbourne and his colleagues.

Seven years have, however, elapsed since this celebrated discussion :—the tithe question has been adjusted, but the Tithe Bill was allowed to pass without an appropriation clause ; not, we believe, from insincerity of motive, but because the opportunity of carrying it had been lost. The great reforms required in the Church, the law, and every branch of the administration, should have been commenced in the first Reformed Parliament, when the strength of the Ministry was irresistible, and when the timidity of the hostile majority of the House of Lords would have led them to shrink from effective opposition. In the second Parliament it was too late ; the enemy had recovered from their groundless alarm, and laughed at the bugbear by which they had been recently put to flight. Hence the supposed necessity, on the part of the Melbourne Cabinet, of a policy of conciliation—a policy which, although it only served to show their weakness, was not abandoned till the time when moral courage could be of no avail.

The hopes of Reformers revived on the reconstruction of the Reformed Cabinet in May, 1835, purified, as it was supposed to be, of its anti-Reform influences, in the persons of Sir James Graham and Lord Stanley. Some surprise was expressed that Lord Brougham had been sacrificed by his colleagues ; but the public were given to understand, in private whisperings, that his lordship was too self-willed at the council board, and too indiscreet in his public speeches, not to

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* For Mr. Abercrombie,	-	-	-	-	-	-	316
Sir Charles Manners Sutton,	-	-	-	-	-	-	306
Majority,	-	-	-	-	-	-	10

The number of members present on this occasion (622) was unprecedented.

damage any Ministry of which he formed a part. Whatever force there may have been in these reasons, they have never appeared to us sufficient. The exclusion of Lord Brougham seemed scarcely honorable; and some little allowance might surely have been made for the crotchets and waywardness of one gifted mind, in a Cabinet in which some of its members, at least, were but slenderly endowed with similar intellectual powers.

The Cabinet of Lord Melbourne now stood as follows—Lord Althorp (by his own desire,) retiring altogether from office :—

Lord Melbourne, (William Lamb,) First Lord of the Treasury.  
 Mr. Spring Rice, (now Lord Monteagle,) Chancellor of the Exchequer.  
 Lord Auckland, (George Eden,) First Lord of the Admiralty.  
 Lord Holland, (Henry Edward Fox,) Chancellor of the Duchy of Lancaster.  
 Lord Palmerston, (Henry John Temple,) Secretary of State for Foreign Affairs.  
 Lord John Russell, Secretary of State for the Home Department.  
 Lord Glenelg, (Charles Grant,) Secretary of State for War and the Colonies.  
 The Marquis of Lansdowne, President of the Council.  
 Lord Duncannon, (John William Ponsonby,) First Commissioner of Woods and Forests and Lord Privy Seal.  
 Sir J. C. Hobhouse, President of the Board of Control.  
 Viscount Howick, Secretary at War.  
 Mr. Poulett Thomson, President of the Board of Trade.

The first step taken by the new Cabinet proved, to the disappointment of the public, that Lord Melbourne and his colleagues were not prepared to adopt a more liberal policy than their predecessors. This was their refusal to repeal the taxes on knowledge, or taxes on that branch of knowledge of most importance in the daily business of life, relating to news or intelligence.

In all modern revolutions we find that the first use the people have made of their newly acquired freedom, has been to establish the liberty of the press. The Reform Bill had been styled a revolution, though of a peaceful character, and it was surely not an unnatural or an unreasonable expectation, that the liberty of the press should be one of the first fruits of that measure. This idea had taken such possession of the public mind, that the abolition of the stamp duty on newspapers, and of the duty on advertisements, had become the great question of the day. Public meetings, (at one of which Lord Brougham presided,) were daily held upon the subject, and upon no other topic were so many petitions presented to the House.

A great excitement prevailed. To maintain the law in its integrity, (the stamp duty being then 4d.) had become impossible. Public opinion countenanced its daily violation. The Chancellor of the Exchequer admitted the impossibility of enforcing it, and stated to the House the fact that, notwithstanding the number of prosecutions and convictions, fines and imprisonments, constantly on the increase, 200,000 copies of unstamped newspapers, sold at the price of 1d. and 2d. were published weekly in defiance of the law. A change had, therefore, become inevitable, and a reduction of the duty was contemplated by Ministers, on the principle that the duty of fourpence offered too high a premium to



the illicit trader. It was, however, too late to propose a reduction of the duty as a popular boon. The press had become *de facto* free, or so to a great extent, and the people only required that its freedom should be recognized *de jure*.

A mere reduction of the duty was even deprecated, because it was presumed such a measure would be accompanied with stringent powers for the suppression of all papers published without a stamp, and would favor the monopoly of the leading journals. This was the view taken of the question in several articles which appeared at the time in the "London and Westminster Review," and other journals, and efforts were in consequence made, by personal interviews with influential members of the Cabinet, to prevent this serious mistake being committed.

In less than a week after the return of Lord Melbourne and his colleagues to office, a numerous deputation, headed by the late Dr. Birkbeck, (a man universally respected,) waited upon Mr. Spring Rice to urge the entire abolition of all fiscal impediments to the diffusion of political and general information. Mr. Spring Rice professed himself a convert to the views of the deputation, and pleaded only financial difficulties; this, however, did not prevent his taking the very opposite course in the Bill which he subsequently introduced to the House of Commons. Another more numerous and influential deputation, but headed as before by Dr. Birkbeck, then waited on Lord Melbourne, to remonstrate against the passing of the Bill brought in by the Chancellor of the Exchequer. The large receiving room, and the adjoining ante-room in Downing street, were crowded with members of Parliament and others who had taken an interest in the subject. Mr. Spring Rice was present, the impersonation of smiling diplomatic affability, with his more formal colleague, Lord Melbourne, whom it did not appear quite safe to approach, as he leaned back in his easy chair during the interview, sullenly and silently listening to the observations addressed to him.

Dr. Birkbeck, in an extremely clear and forcible manner, stated the effect of the newspaper stamp in excluding the working man from political information. He pointed out the annihilating effect that the smallest stamp would have upon such publications as "Chambers' Journal" and the "Penny Magazine," supposing the system extended to them. He showed, as facts have since verified, that with a penny stamp no daily or weekly newspaper could be published under 4 1-2d. or 5d., through the additional capital required, and the restrictions necessarily imposed. That such a price would as effectually place newspapers beyond the reach of the mechanic and the humble tradesman as if the price were continued at 7d.; and asked why, in a country of free institutions, the liberty of the press was to exist in name only for the poor, as a reality only for the rich.

Other members of the deputation alluded to the dangerous tendency of a practicable monopoly in the direction of public opinion given to a

few London daily journals,\* and the stringent character of the measure proposed for the suppression of the unstamped.

Lord Melbourne interrupted none of the speakers by a single word. When they had done, he asked if any other gentleman wished to speak, and then told them briefly, but decidedly, that their arguments had produced no change whatever in his opinion. His reply excited much irritation, and more than one member of the House of Commons then present got up and said with much warmth, that a Government that could commence its career by practically declaring the people unworthy of a free press, was not deserving public confidence or support.

The Government, however, persisted in its course, and an act, (the 6th and 7th of William IV., cap. 77,) which we have ever regarded as a disgrace to the statute-book, and from which the French Ministers must afterwards have borrowed some of the provisions of their Fieschi Code,—passed into law.

The act authorizes the seizure, not only of unstamped papers, but also, and without any form of trial, the seizure of the presses at which the newspapers were printed; thus summarily ruining at a blow, upon the simple affidavit of a common informer, any printer directly or indirectly connected with an unstamped publication.

Other clauses of the act are of a corresponding tenor, and of course the unstamped press was put down. This was the beginning of the Melbourne Administration. Earl Grey had introduced the Irish Coercion Bill; Lord Melbourne followed his example with one for England.

We have dwelt somewhat upon this for two reasons: one, that it is not a fact the public ever hear of through the medium of existing journals, the editors of which, however friendly to an unshackled press, are not held at liberty to allude to changes which might affect the interests of the proprietors by encouraging rivalry; the other is an opinion, that no step taken by the late Government embittered the feelings of the working classes against the Whigs so much as this act of Lord Melbourne's Cabinet, and we believe it chiefly contributed to their final defeat.

No matter how indifferently the unstamped journals were conducted, (though some of them would fairly bear a comparison with the best of the stamped press, while there was not among them one which did not exhibit a higher tone of morals than the "John Bull" or the "Age,") they were the organs of opinion for a numerous class, which had no other organ, and felt the want of no better—a class now told in one and the same breath that they should neither have a press of their own nor an amended Reform Bill. What was their conclusion? It was vain

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\* This arises from the limited nature of the market. The poorer class of buyers being excluded, the present proprietors of newspapers know that there is but little chance of successful competition. So ineffective was the reduction of the stamp duty in 1835, that it has not led to the publication of a single additional daily newspaper in London.

to hope for liberal measures from the party in office, or the middle classes by whom it was supported. It was now time for the operatives to form a party of their own. They did so, and adopted for their rallying cry "The Charter;" a document not written nor contemplated at the time of the deputations to which we have referred, but which has since, however crude and impracticable in its details, had a most potent effect upon the public mind.

We need not stop to prove that the Chartists had no inconsiderable share in the fall of the late Government, their very existence contributing to that end by alarming the timid. That the efforts of the Chartists seriously damaged the late Ministers, by depriving them of the support of public meetings, by a Tory coalition, and by proceedings often unreasonable and sometimes riotous, is obvious to all. For this the Chartists—goaded, irritated, despised—may be condemned, and perhaps justly; but "let those who are without sin cast the first stone."

The blunder committed in refusing to repeal the taxes on knowledge, and in putting down the unstamped press with a strong hand, will become the more apparent when the influence of the stamped press in the overthrow of the ministry is considered. Of the five morning journals which give the tone to public opinion three are Conservative; one, the most influential of all, having suddenly changed sides, and devoting the whole of its immense influence to the ruin of the party it had formerly supported. For some years previous to the 18th of November, 1834, the "Times" had been the champion of popular rights, going even to the extent of recommending, during the agitation of the Reform Bill, armed associations of the people, and giving significant hints of the use that might be made of brickbats as a cure for the obstinacy of lordling Conservatives. When the Reform Cabinet was dismissed by William the Fourth, a paragraph appeared in the "Times," ending with the words, "The Queen has done it all." The next day came an apologetic note from the editor, and, to the astonishment of the public, a series of articles was commenced in favor of the new Conservative Administration.

We shall ever hold it a sign of incapacity on the part of a statesman not to perceive that a paper conducted with the ability of the "Times," with its ten thousand subscribers and fifty thousand daily readers, is a power in the state, equal, if not superior, to his own. Governed as this country is by public opinion, and governed as opinion is, not by books of philosophy, which few have time to study, but by newspapers, which every body reads, we would rather have the direction of the columns of the "Times" than the proxies in our pockets of a majority of the House of Lords. Truth is more powerful than falsehood, but not when bound and gagged, or allowed utterance only through some licensed medium. The strongest judgment yields at last to the impressions produced by falsehoods daily reiterated, as the dropping of water upon stones wears away the hardest rock. It is blindness not to see that the "Times" had infinitely more to do with the fall of the late Ministers

than the ten Liberal members who deserted them on the Jamaica question, and have been accused of producing that result.

It is held to be wonderful that the late Ministers lost ground in the City, where in every counting-house the "Times" is read, and must continue to be read, which ever side it takes, until some other paper rivals it in the execution of its business details? What is the power of a hired lecturer addressing once a week a popular assembly, or that of a brilliant speaker in the House of Commons now and then delivering himself of a splendid oration, compared with that of a proprietor of the "Times" directing the editors, who every day throughout the year, and year after year, address fifty thousand readers upon one unvarying theme, and the majority of those readers men of no decided opinions of their own? \* Two courses were open to Lord Melbourne : to weaken this gigantic influence by allowing a free trade in political information, † or to buy over its influential proprietor by the baronetcy, said to have been asked and refused, or some similar cheap lure for weak minds. ‡ Lord Melbourne did neither ; he despised his enemy, like many an other feeble general in a similar position, and from the same cause fell.

The measure adopted by the Cabinet was even one which, in its immediate result, gave additional strength to their opponents. It increased at one stroke the profits of the "Times" by £2,000 per annum ; § and a personal triumph was not wanting, for in the case of that famous majority of *one* which precipitated the fall of the Melbourne Cabinet, that one vote was the vote of John Walter, member for Nottingham, recently returned as if for but that object only, but a month previous to the dissolution.

The most important measure of the second session was the Bill for

\* Let those who think that the Poor Law Bill became unpopular through its own demerits calculate, if they can, the difference in the impression which would have been made upon the public mind if the "Times" had given one of its editors £1,000 per annum to point out, day by day, the excellencies of the measure instead of its defects.

† The "Times" has sometimes asked triumphantly, "Who would find the enormous capital required to give a chance of successful competition, on the part of a new journal, with an establishment like our own?" No one certainly, while the present restrictions remain ; but if the press were free, but little capital would in the first instance be required. Numerous cheap journals, corresponding in size with "Chambers' Edinburgh Journal," would immediately spring into existence, perhaps in the form of political and periodical essays. Some one or other of these would probably attract attention by superior writing, and gain at once a considerable circulation. Gradually increasing in its sale, and in the number of its advertisements,—growing more and more into notice every day, the capital would soon be forthcoming for foreign expresses and parliamentary reports.

‡ In France the influence of journalism is so great that we have seen a clever editor made a minister, and it must come to this in England if we persist in the same folly of protecting from competition, by stamps, deposits, and securities, a few journals, and give them an undivided influence over public opinion.

§ The reduction of the newspaper stamp duty was twopence and one-fifth of a penny. The London daily press pocketed the one-fifth, and gave the public only the benefit of the twopence, reducing their price from sevenpence to fivepence. One-fifth of a penny, upon a daily circulation of ten thousand copies, amounts to the sum of £2,600 per annum.



the reform of the old municipal corporations (5 and 6 William IV, c. 73), which received the royal assent September the 9th, 1835. This measure, although it had been three years in preparation, exhibited on the part of the Cabinet the same inability to grasp the whole of a comprehensive subject which had been shown in the case of the Reform Bill. Both measures seemed cast in the same mould, having the same excellencies and defects; both were valuable to the extent that they were destructive of ancient abuses, and all but worthless in what related to reconstruction. The old corporations were viewed as so many fastnesses of corruption, to be destroyed chiefly because their influence at elections had been exerted in favor of the opposite party. What were the proper objects of local government, where the line was to be drawn between the duties of a national and a provincial or municipal assembly, belonged to a subject which it would have been too troublesome to discuss, and in which all inquiry was postponed *sine die*. Yet, if ever a time should arrive when a honest and intelligent Government shall seriously set about adapting our institutions to those most required for a free people, this would be the first question that would occupy its attention. Next to a good measure of Parliamentary Reform, nothing is of so much importance as the providing some uniform and efficient machinery for all local business to be transacted in town or country, too minute in its character for the deliberations of a central administration. The Municipal Reform Bill was scarcely a step towards this end; it left the counties as it found them; it left all the towns as it found them, excepting 178; it restricted the objects of municipal government to paving, watching, and lighting, some corporations only excepted that had other privileges by ancient prescription. Even to the extent of these limited powers it made no provision for their undisturbed exercise; and thus the curious spectacle has been seen, of old paving and lighting boards and new Town Councils both levying rates for the same object in the same town, and spending the money of the rate-payers in courts of law. The needful powers for building bridges, widening streets, founding schools or hospitals were withheld: in some instances, indeed, the old corporate towns were robbed of privileges of great value to increase the power of the Church. This was the case in towns such as Liverpool, where, by the possession of advowsons, the people had a voice through their local representatives in the nomination of their own clergy. The advowsons were ordered to be sold (see clause 139), and all vacancies directed to be supplied by the bishop of the diocese.

The great giant abuse of all, the Corporation of London, was left untouched; and, in spite of repeated pledges to take up the subject, has been left untouched to this day. Perhaps no part of the history of the late Administration is so humiliating as the record of the feebleness and irresolution of Ministers whenever they found themselves opposed by the interests of this corporate body. Profoundly ignorant of the real estimation in which the Corporation is held by the public, imagining it to possess a moral influence in the city of which it scarcely retains a vestige, they allowed themselves, on more than one occasion, to be

fairly terrified by the big looks of the Lord Mayor and Aldermen. To conciliate such formidable opponents, their complimentary presentations of freedom, and their invitations to state dinners, were accepted; Ministers not only dining repeatedly with the Lord Mayor for the time being, but, even when hissed and insulted at his board, dining there again; and from the same motive giving up to the Corporation without a struggle, at a loss to the public of £20,000 per annum, a share in the management of the metropolitan police; and gravely and not ironically proposing to the Court of Aldermen and Common Council that, as a reform of their constitution was said to be needed, they would undertake the task themselves, in a spirit of virtuous self-immolation !\*

It cannot be supposed that city of abuses, notorious as they were, had made no impression on the mind of Lord Melbourne, but his Cabinet lacked the courage to grapple with the evil. At first it was a tender subject, for a majority of the Court of Common Council were at one time friendly to Government; afterwards the majority became Conservative, and the loss of further influence in the city seemed to be apprehended. Principle was therefore to be abandoned for expediency, and with the usual short-sightedness of those who turn aside from the straight path, it was not seen that the sacrifice would only defeat its end. The timidity displayed by Ministers, "willing to wound, but yet afraid to strike," did not gain a single enemy, but cooled the ardor of many friends. Had there been, five years back, a searching reform of the London Corporation—a reform similar to that for which a large majority of the inhabitant householders had petitioned, which would have destroyed the sources of corrupt influence, two Reformers would not have been lost to the city at the last general election, and Lord John Russell would not himself have barely escaped defeat by a majority of nine.

Of course the reform of the city trading corporations was also postponed, and the voluminous reports of the Charitable Trust Commissioners were allowed by the same Ministry to remain a dead letter, so far as the passing of any legislative enactment was concerned of a remedial nature.

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\* The abuses of the corporation of London are without a parallel in the world. The Corporation has the management, directly or indirectly, of between £500,000 and £600,000 of public money passing annually through its hands. The way in which this money is expended may be gathered from the fact, that the twelve chief officers of the city cost the country more than the twelve Ministers of State forming the Cabinet; even the potatoe and fruit meter receiving more than the President of the Board of Trade (see a pamphlet published by Hooper, entitled "Local Government of the Metropolis"). Mr. Williams, M. P. for Coventry, stated in the House of Commons, that the cost of the mayoralty with its appendages alone was £25,000 per annum. Admitting it to be but £15,000, as the Corporation contend, what would be said in any other case of such a sum being devoted to the duties of a police magistrate and the chairman of a public board? The Corporation, notwithstanding, represents but a twelfth section of the metropolis: its so-called system of representation is a delusion, some of its wards being as rotten as any of the boroughs included in Schedule A, and the greatest merchants in the city having often no voice in the return of the city officers.

A similar indisposition to grapple with administrative questions, the adjustment of which, from conflicting interests, would have been attended with some trouble, was manifested in many other instances. Eight years have elapsed since Mr. Warburton moved for a Committee to inquire into the state of the medical profession. (Feb. 10th, 1834), and up to the present moment Government has not been prevailed upon to originate or support any measure ensuring a proper educational qualification for the practitioners of medicine or surgery.

This object, although one of the deepest moment, only shared the neglect which the general question of a national provision for the education of the people was fated to receive from the same Cabinet till the time came when the Church saw and availed itself of the opportunity of taking it out of their hands. The opposition which the Government project of a normal school encountered two years ago, originated solely in the weakness of the Cabinet; a weakness which tempted their opponents to use the question of education as a *cheval de bataille*. In former days there would have been no such difficulty. The letter of Lord Stanley, (then E. G. Stanley,) constituting the Irish Education Board, is dated Oct. 1831. Was it necessary to wait ten years before a similar Board could be formed in England? or can it be fairly attributed to Conservative opposition that, although a Board was established in Dublin, only the most inadequate grants were annually voted for the schools of the sister kingdom?

The truth is, that among the most influential supporters of Lord Melbourne's Government, there were some as much opposed to popular instruction as any belonging to the opposite camp. Individuals, members of the Cabinet whom it would be individious to particularize, though, were we to mention them by name, it would be only justice to their more intelligent colleagues, did not hesitate to say in public companies, that there was too much education in the country, and defended their opinion by repeating the old and worn-out fallacy, that books unfitted the laborer for the duties of life. Too much education! The assertion refuted itself: *they* alone were a proof that some had received too little. When will there be a school in which such statesmen may learn wisdom, and a dunce's form or a fool's cap for the man who can see in the dissemination of knowledge no blessing to the human race,—who is content that the cottager should spend the leisure of his long winter evenings in lazy sottishness, and would measure out to the poor man with a grudging hand God's intellectual gifts?

Some indication was at last given of a better feeling and a higher purpose; but we cannot agree that the steps taken to promote national education during the last year the late Cabinet held office are deserving unmixed commendation. They refused, by postponement, the opportunity of making an excellent beginning in establishing district schools of industry in connexion with the new Unions, in place of the schools now held in workhouses under the most contaminating influences. A carefully digested plan for thus commencing the work of education with at least 100,000 children of the lowest class, and to which there would

have been no serious opposition, was laid aside. The project of a normal school was substituted and abandoned without a division, when a defeat would have paved the way to victory : finally, a Board of Education was appointed for England, but not a Board independent of party, like that created for Ireland ten years before by Lord Stanley, but a political educational Board, changing with every change of Cabinet ;—a Board which, from its very constitution, must give a Whig or Tory bias to whatever it undertakes for popular instruction ;—composed of members absorbed in the party conflicts of the day, or distracted by other cares of state, that would unfit the ablest minds from watching over the interests of the rising generation.

We have looked through all the acts of the Melbourne Government connected with administrative questions with an honest desire to relieve the tone of these observations—marked, we fear, by too much asperity—by noticing measures deserving the unqualified approbation of Reformers. One perhaps, at least, of that complexion (and we would that the instances were more numerous) presents itself in the Bill passed for the registration of births, deaths, and marriages ; a most useful statistical measure.

The new Marriage Act was a measure of justice to Dissenters ; let us be thankful for that, and not the less because the principle of the Bill was one recognized by Sir Robert Peel in a similar Act introduced by him during his brief interval of office in 1835.

The Bill for the commutation of tithes was a measure excellent in principle, but most imperfect and unsatisfactory in its details, some of them most unjust and burdensome in their operation. We can praise neither the Bill nor the mode in which its provisions have been carried out. The Bill has been used as a screw for increasing the revenues of the Church ; all the appointments connected with its machinery having been made with a view obviously to this end ; but the object has been attained, and chiefly at the expense of small proprietors, not of the great landowners, who have brothers and sons in the Church. In the case of the small proprietor, heavy burdens have been fixed upon him, which he formerly found the means of evading ; while the Bill (and this must not be overlooked), by rendering the commutation dependent upon a system of averages, has given the clergy an interest in upholding the existing Corn Laws. The profound silence of all the Conservative journals on the proceedings of the Tithes Commission is the best practical indication of its character.

The most popular measure of the late Administration, and that on which the interests of the poorer classes were most fairly consulted, was the Penny Postage Bill. A most fortunate concurrence of circumstances allowed this Bill to pass at the only possible time, perhaps for twenty years, when there would have been a chance of such a measure being adopted. The leaders of the opposition viewed it as a trap to excite against them a popular clamor, and hesitated too long in their resistance to render it effective. The Bill passed,—the greatest boon next to free institutions, ever conferred upon a nation ; a measure preg-



nant with inestimable benefits connected with the moral, social, and intellectual progress of the people, of which it will be long before we know the full extent.

We wish we could add, that the steps taken to carry out the principle of the Bill were as praiseworthy as the spirit in which it was introduced. Here, as in other instances, the risk of failure was encountered through the want of courage to remove existing impediments to the fair trial of a new and important experiment, while the dull moral sense of the Cabinet failed to make them perceive what was due to the author of the measure. Fault has been found with the expenses incidental to the new system—expenses for many of which neither the system nor its author, Mr. Rowland Hill, should be held accountable. Mr. Rowland Hill, with whose services, we believe, it was in the first instance proposed to dispense entirely, was not allowed by the late Government to superintend the working of the measure in its practical details. We find on inquiry that he was placed in an office which did not permit him to interfere with Post-office arrangements, except indirectly through the Lords of the Treasury. He had no authority whatever in St. Martin's-le-Grand, where the greatest opponents of the measure, the late Postmaster-General and his secretary, were allowed to reign uncontrolled. Lord Litchfield and Colonel Maberly had prophesied the failure of the measure: whether they felt any anxiety to falsify their own prediction by giving effect to the most economical arrangements, we must leave to the judgment of the reader.\*

A volume might be written on the abuse of Government patronage in the appointments of the late Administration. Perhaps the best they made were, on the whole, those in the Church. In the majority of other cases the special fitness or unfitness of an individual for peculiar duties appears rarely to have been considered. Offices were too generally (we will not say invariably) distributed as party expedients; and no matter what office was first vacant, it was given to him who stood first on the list for promotion. Thus, to the astonishment of the navy, and afterwards of the commercial interest, Mr. R. L. Shiel, whose eloquence at the bar might have qualified him for the post of Attorney-General, was made Commissioner of Greenwich Hospital, and next Vice-President of the Board of Trade. But we leave this, the most distasteful part of an ungrateful subject, to glance at the progress of Law Reform.

During the ten years of our political retrospect, can we honestly say that ten good measures of law reform, upon a scale at all corresponding to the reasonable and just expectation at one time entertained, have

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\* In many important particulars the measure adopted by Government differs from that which had been recommended by Mr. Rowland Hill. For example, the present scale for overweight did not originate with him. It was no part of Mr. Hill's plan that small four oz. parcels, that used to be carried by the London district post for 2d., should, under the new system, be charged 8d., to the great benefit of the London Carriers Company, and a loss to the revenue of about 300*l.* weekly.

been obtained at the hands of the late Administration? Can it even be said that as much zeal, energy, and perseverance were displayed by the Liberal Government on this subject, as was shown by the former Government of Sir Robert Peel? We fear not. Let us, however, do justice to one member of the Reform Cabinet. If some of the measures attributed to Lord Brougham when in office are fairly open to the charge of having been too hastily put together, his indefatigable industry, and the sincerity of his desire to promote the object, cannot be denied. Nor should the praise be withheld of his having originated, or taken an active part in, the most useful measures that forced their way through an unwilling or indifferent assembly.

The foundation of all future Chancery reforms was laid by Lord Brougham in his Bill and regulations for substituting salaries for Chancery fees, which removed at once the hostility of the officers of the court to further changes, on the ground of personal interest. Of Lord Cottenham's subsequent labors in the same court, and especially of his Equity Judges' Bill, it is but right to speak with the utmost respect.

In the Bankruptcy courts the new system of official assignees, though left open to some abuses which ought to have been foreseen and might easily have been prevented, saved to the creditors at least 25 per cent. of the property formerly wasted on every estate passing through the "Gazette."

The Central Criminal Court for the Metropolitan district was also an important measure, which rendered justice more speedy and certain, and therefore more effective, than it had been before in the metropolitan districts.

We may notice also, with satisfaction, the amelioration of our criminal code, effected not so much by Ministers as through the exertions of Sir Samuel Romilly, in the abolition (in certain cases) of the punishment of death, and the permission given to prisoners accused of capital offences to employ counsel. We note also, and with pleasure, the amendment of the old usury laws; and had we space, we would touch upon sundry small and not unimportant measures, such as the Bill for the recovery of small tenements, superseding in their case the old process of ejectment.

The latter reminds us of the special commission appointed in 1828 to inquire into the state of the laws relating to the transfer of real property, of which we believe the principal fruit was the Bill for the limitation, in certain cases, of actions and suits, (3 and 4 William, c. 37). Some other slight alterations were made, but the transfer of real property is attended with little less delay, formality, and expense, than at any former period. The grievance, and an enormous grievance it is, has scarcely in the slightest degree been abated.

While we write, the visions indulged in by the sanguine Reformers of 1830 rise to our recollection—visions in some of which we ourselves shared, of the measures which a Reform Administration would be certain to undertake. The codification of the laws;—simplification of legislative enactments;—justice brought to every man's door by accessible tribunals;—rational rules of procedure;—a good magistracy in

place of the great unpaid ;—a new law of libel—Alas ! how have our day dreams been dispelled ! In 1842 our lawgivers are not yet convinced of the propriety of establishing local courts\*—nine years of slumber, and the subject is now revived for discussion. True it is, that in every session something has been said of law reform, but this is but a poor consolation for the little that has been effected. A multitude of measures have been brought forward only to be strangled in their birth, or abandoned for want of effective Government support. A list of these we had intended to present to the reader, but we were alarmed at its length, and omit it from the space it would have occupied. Already we are trespassing upon his patience, and must hasten to a conclusion. A word only upon our foreign relations.

We would speak with respect of the celebrated protocols of Lord Palmerston, in the case of the differences between Belgium and Holland. We like diplomatic verbiage infinitely better than the argument of the sword, and in this instance it is a subject for congratulation that protocols were ultimately successful.

In the case of Poland, by which so much interest was excited that it became an English question, we would in charity believe that everything was done Lord Grey conceived possible to save that unhappy country from the ruin with which it has been overtaken. We will hope that the fact was, as the friends of Earl Grey represented it, that Poland could not have been saved without a European war, and if so, it was a wise policy that would not incur the risk.

Would that the same wisdom had guided the councils of Government in the case of Syria. Here we engaged in a war not in the name of freedom, not for any object which Englishmen had at heart, but a war in favor of Turkish despotism, and of which the only rational explanation is that Egyptian despotism was held to be somewhat worse, and that we were jealous of the interference in the quarrel of France or Russia. Syria rues the day when it listened to our offers of protection. Sir Charles Napier rises in the House, and deplores the anarchy and ruin he was the unfortunate agent of bringing upon that country. All join in lamenting the alienation of France produced by our policy, and its general results. Never in the worst times of Tory government had a war been undertaken more recklessly, wantonly, wickedly, than this for the coercion of Mehemet Ali, and never had been the failure of our foreign policy so signal and complete.

The energy and resolution displayed in the case of Syria contrast unfavorably with the feeble and tardy assistance given to the constitutionalists of Spain. Here we had a much fairer ground for interference,

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\* In using the term we must guard against a misconception of our meaning. We are not friendly to the rule that where there are local courts the judges should in all cases be locally resident. Suitors will always apply to the highest legal talent, and if that is only to be found in London they will apply there. The question is one of comparative expense. Shall the judge go to the suitors in civil as in criminal cases, or plaintiff, defendant, and a host of witnesses perform a journey to the judge ?

and one more closely connected with English interests. It was admitted, too, that we were bound by treaties to support the party of the Queen. Here a prompt and vigorous effort would have put an end to the horrors of civil warfare, year after year assuming a more sanguinary form. What did we do? We sent now and then a handful of marines and a steamboat to aid occasionally the volunteer corps of Gen. Evans,—a corps fighting without pay, without food, without shoes to their feet, to effect nothing—gaining sometimes fruitless laurels, and sometimes encountering unavoidable disgrace. This was not the way to maintain the honor of the British flag, nor to attain any object for which it was worth while to contend.

We are no advocate for Quixotic expeditions to settle the differences of nations, but if we must interfere in foreign quarrels, let us not be guilty of the barbarity of prolonging the misery they bring upon the country by half measures. When England takes the field, it should be in its irresistible might. Humanity, still more than the national dignity, forbids a "little war."

The disastrous result of our campaign in India is a painful topic of reflection—another war occasioned by our restless monomania on the subject of Russia. To counteract the real or supposed intrigues of Russia with petty distant states, we advance far from our resources into a country of mountain fastnesses, espouse the cause of an imbecile, unpopular, and dethroned prince, and make enemies of a brave people, amid their own rocks and snows, more than a match for our sepoy regiments.

In China we have another war upon our hands, of which it is not easy to foresee the end,—a war which has placed in jeopardy one of the most flourishing branches of British commerce. Will any one say that this war might not have been avoided? What steps were taken to avoid it? The quarrel began in a profound ignorance of Chinese ideas and institutions, and in the entire absence of every precaution which might have been taken to prevent misunderstanding, or hostile collision, when the power and influence of the East India Company were withdrawn. And what have we now to plead in justification of our appeal to arms? The Chinese Government sought, by a stretch of power beyond the law, to put down the smuggling on our part of a prohibited and deleterious drug. Granting that the plea may be sufficient, who would not wish that it were more satisfactory? Have the smugglers on our own coasts been always treated with more ceremony? Is our own preventive service a better observer of the forms of justice?

We conclude the list with Canada. And here we are told to believe that it was not the fault, but the misfortune, of a Reform Administration, that rebellion, with all its horrors, broke out in the nearest of the British colonies, followed by a frontier war, and differences between this country and the United States, which at one time threatened the entire interruption of our commercial relations with North America. Let us glance at the leading facts.

From 1828 to 1837, year after year, and session after session, the



grievances, real or assumed, of Lower Canada, had been the subject of parliamentary discussion. It was stated by Committees in Reports, and by the late Ministers in speeches, to the House, that many of those grievances were idle and illusory; and no doubt, they were so to superficial observers. The American Revolution to such men had been but a quarrel about a chest of tea, which was undoubtedly but a bad pretext for the separation of thirteen colonies from the British Crown. But who is not now sensible that the root of the matter was not there? The refusal of the people of Boston to pay a duty on tea, was only one of the modes of asserting the old Saxon right of self-government; and was it so wonderful that French and English Canadians should at last catch some of the same spirit, with the Revolution of July, the English Reform Bill, before their eyes? Was the desire to have a greater share in the management of their own affairs so undeserving of the sympathy and respect of a Reform Administration that it could only be met with the bayonet? It seemed so. Remonstrance, importunity, solemn warning, were alike disregarded; and the prayer of the Canadians for an extension of their rights was even answered by a violation of that which they held most sacred. The right which in England has ever been the boast of the House of Commons,—the right of stopping the supplies, had been acted upon (injudiciously, we think) in Lower Canada by the House of Assembly, and the intention was announced of continuing to do so, till the Legislative Council was rendered elective. We defend not this extreme step, which at one time, at least, was quite unnecessary, but neither can we approve of the retaliative policy of the Home Government. Wrong does not justify wrong. On the 6th of March, 1837, Lord John Russell moved a series of resolutions depriving the House of Assembly of this power, taking away from it all control over the revenues of the Crown, denouncing the proposition of an elective Legislative Council, and again postponing, with indefinite promises, the consideration of any plan of pacification.

The following August, on the dissolution of the Assembly by Lord Gosford, the insurrection broke out: the battles of St. Charles, St. Denis, St. Eustache (a few months later) followed. Many hundreds were shot in the fields, or burnt in their houses, or driven into the woods to perish. The discontented of Upper Canada joined in the movement, but only to meet a similar fate. Defeated, and flying with the story of their wrongs across the frontier, they enlisted the sympathies of the American border population in their favor. Neutrality was violated on both sides—mutual reprisals followed—the “Caroline” was destroyed in American waters—Sir F. Head issued inflammatory anti-American diatribes—M’Leod was seized and threatened to be hanged, and for many months a war between England and the United States appeared to be inevitable.

The struggle is over—the insurrection has been quelled; and having at length seen the necessity of conciliating the Canadian population by measures rendering their interests less dependent upon the Colonial Office, British subjects have returned to their allegiance.

And now for what have we been fighting?—why this waste of blood and treasure?—what have we been doing but endeavoring to remedy the mischief occasioned by our own want of foresight, or our too culpable indifference? Had measures conceived in the spirit of Lord Durham's Report been introduced in 1834, all the calamities to which we have alluded would have been prevented. We challenge contradiction to the fact, that even in 1837, had Lord Durham's Report then appeared in place of the ten resolutions of Lord John Russell, public confidence in the intentions of the British Government would have been at once restored, and History would not have had to record a Canadian Rebellion.

In the above wars and military conflicts, is it an exaggeration to say that ten millions sterling have been fruitlessly expended? Grant that the amount be somewhat less;—need we go further to account for the present deficiency of revenue? How many measures of national utility have stood still for want of the funds unnecessarily devoted to the arts of destruction.

Here we pause. We must close our summary of the political history of the last ten years, though at the risk of being charged with the omission of many facts which would possibly have told in favor of the late Administration. Let the reader make a liberal allowance for such omissions, but yet ask himself the question, has not enough been said to show that there are other causes to account for the fall of the late Ministers than the self-complacent assumption that they were too good for the times?

Undoubtedly it was true that the counties and small agricultural towns were not prepared for the change proposed in the Corn Laws; but whose fault was it that the landed interest was made predominant by the Reform Bill, and not rendered so by accident, but premeditatedly and avowedly? Whose fault was it that the enthusiasm of Reformers, which would have carried them all lengths in support of Ministers in 1832—which, even in 1835, defeated the machinations of a hostile Court—cooled gradually into apathy and indifference, giving way to feelings of bitter disappointment? The bold stroke, the generous free trade policy, came at last, but came too late—power was gone. The registration clauses had done their work—the rottenness of the electoral system had been discovered—constituencies created, to be sold to the highest bidder, had allowed themselves to be bought. Why complain that the commercial interests of the large towns were unable to save a Ministry, when even in those towns the seeds of corruption had been left to germinate?

Practically, too, a great mistake had been committed by the attempt to carry on the Government with the Parliament of Sir Robert Peel—a Parliament in which, from the smallness of the Liberal majority, no measures could be carried but by a compromise; and in which, therefore, the Cabinet of Lord Melbourne was constantly exhibited in such a tottering condition that the public became accustomed to the idea that the Conservatives only could form a strong Government.

At the last election, from this cause, the opinion of the necessity of a change had become almost universal, and but for the free trade agitation, a majority of Conservatives, much more overwhelming than the present, would have been returned. The result should be a lesson to statesmen. Every year that office is retained by men unable to carry their own measures, they damage their party. A bad Government is an evil, but that which is powerless has no friends.

The second advent of the Tories has scarcely excited regret in any quarter. Reformers remembering that Catholic emancipation, the repeal of the Corporation and Test Acts, and many excellent measures of administrative and legal reform, were obtained through the instrumentality of Sir Robert Peel, have augured favorably from the fact that the influence of public opinion upon Conservatism, when Conservatives are in office, has ever been greater than when in opposition. If these sentiments were entertained among Reformers, how much less likely were the electors at large, with such a constituency as the Reform Bill has created, to imagine that their own interest, or the prosperity of the country, was connected with the fortunes of the late Administration.

Our brief political sketch presents but a melancholy contrast to the narrative that might be written of the progress of science and the arts during the period we have described. It is only as legislators and politicians that the men of the nineteenth century appear as dwarfs of intellect: in every other branch of knowledge they stride with the step of giants. The annihilation of space and time is beginning to be no fable. The broad Atlantic has been bridged by steam navigation. Old modes of travelling on land have given way to new; a journey of 200 miles is now, in rapidity, a meteor flight. The electric spark has been seized, and made to obey the impulse of the human will. Lightning is our news carrier—light is our portrait painter. The sunbeam has become the pencil of the artist. We are mastering the secrets of the elements, and in the command of all physical agencies take a higher rank than the demigods of antiquity.

Will the time never come when in the higher branches of knowledge—in all that relates to the moral and social—to the arrangements upon which depend employment, subsistence, content, and happiness—a corresponding progress will be made? Shall we never see the day when the few, who hold the destinies of mankind in their grasp, will use their glorious opportunities for benefiting the race to which they belong for other objects than those of personal ambition? Why do not these phantoms of a night perceive that not only power, but even their existence, is but a dream? In deeds and thoughts only is their reality. It seems but an instant, and Huskisson, Canning, Liverpool, Durham, Sydenham, were here visibly before our eyes, in the glory of high office. Where are they now?—where, in another instant, will be the men now legislating for class interests, as if they and their class interests would endure for ever?

Great Father of mankind, if among thy sons nobler spirits have yet

awakened, who with high and god-like aims would stand among statesmen as the Miltons and Shakespeares of the literary world,—if, in the wide circle of humanity, there exist men capable of perceiving the true uses of power, and of directing it aright,—overrule thou the course of events, that another generation may not pass away before self-worshippers being displaced, and the might at last with the right, one worthy effort may be made to raise the multitude from their present physical and moral degradation, and to protect, by institutions worthy of rational beings, the interests of all.—Amen! amen!

## ARTICLE VIII.

### VOLUNTARYISM IN GERMANY.

From the (London) Eclectic Review.

*Die Zukunft der Protestantischen Kirche in Deutschland, vom Standpunkte der Württembergischen verhaeltnisse aus.* [*The Prospects of the Protestant Church in Germany, from the Standpoint of the Wirtemberg relations.* By Karl Wolff, Minister at Bernstein.] Stuttgart, 1840.

AMONG the evidences which the ordinary course of things around us furnishes of the truth that mankind are placed under a righteous system of moral government, there is none more striking than the fact that every institution, which is not based upon truth and justice, sooner or later, even when unassailed by hostile powers, works its own decay. Whatever influences may be combined in its support, however much the prejudices of the people may be enlisted in its defence, and to whatever extent it may be guarded against assault from without, nothing, it would seem, can avail to counterbalance effectually the pernicious operation of its inherent evil, or to save the institution from the ruin which that evil is incessantly tending to effect. "The legs of the lame," says the wise man, "are not equal," and no artifice will ever prevent such an one from halting. Institutions based upon falsehood are essentially mischievous and nothing can permanently prevent their evil from being detected, their iniquity exposed, and their overthrow desired.

Of the truth of these remarks we have an illustration in the growing suspicion and dislike with which multitudes in different parts of Christendom are beginning to regard civil establishments of religion. That in a country like this, where dissent has been so long tolerated, and where it has so extensively spread, the error and iniquity of such institutions should be perceived and exposed, is perhaps little to be wondered at. The feeling to which we have referred, however, is not confin-



ed to this country, but is showing itself even in regions where the sway of the established church is uninterrupted by the toleration of dissent in any of its forms. The volume now before us is an evidence that it has penetrated into Germany, than which we know no protestant country which, a few years ago, seemed more hermetically sealed against the intrusion of any such influence. Nor is Mr. Wolff alone in Germany in the discussion of this question. The voluntary controversy has, in fact, been fairly mooted both in Prussia and in other states of the Germanic empire; and though it has not yet assumed anything of the general interest which it has attracted in this country, the thoughts of many pious and some great minds have, in that part of Europe, been turned to the questions which it involves. The very perfection of their system of church establishments has forced this upon them. Disgusted with the minute and rigid enactments by which the freedom of Christian activity within the Church is fettered, and tired of a system which is mighty in project, but impotent in action, imposing in outward form, contemptible and too often vile in inward substance, they have been constrained to inquire whether what they once deemed the bulwark of religion in their country has not in reality been its greatest obstacle, and the source of its acknowledged depression. Among those who have uttered their feelings and opinions in writing upon this subject, Mr. Wolff is by far the most decided advocate, so far as we have had any opportunity of judging, of the perfect freedom of the church. For our knowledge of his work—the title of which we have translated with a closeness to the original which some of our readers may perhaps be disposed to condemn, but which will, at all events give them some small idea of what difficulties those have to contend with who would render German sentences into easy and idiomatic English—we stand indebted to an article in a late number of the “*Theologische Studien und Kritiken*”—a periodical conducted with great ability by Professors Ullmann and Umbreit, of Heidelberg, in conjunction with Doctors Gieseler, Lücke, and Nitsch. This article is written by Mr. W. F. Frey, Dean at Umstadt, in the grand duchy of Hesse, and after the faithful fashion of German reviews, contains a copious analysis, very much in the author's own words, of the contents of his book. Judging from this article we should not take Mr. Wolff to be a man of very superior mind, but his work seems to be written in a manly and candid spirit, and his opinions are avowed with much distinctness and fervor. Studying his reasonings through the medium of an analysis of them made by a third party, it does not become us to pronounce any very decided opinion upon them. This, however, need not prevent our laying before our readers a general view of the course of remark which the author pursues, accompanied by such observations as may be thereby suggested to us. For this the article by Dean Frey furnishes ample materials; and our readers will thus get a sufficiently correct general idea of how the question of establishments is moving at present in Germany.

Mr. Wolff divides his work into three books. In the first of these, he considers the relation of the church to the state; in the second, he

animadvert, and that in no very measured terms, upon the ecclesiastical institutions of his own district, the duchy of Wirtemberg; and in the third, he gives utterance to the hopes and wishes with which he is inspired for the future. It is to the first of these that we intend, almost exclusively, to confine ourselves at present, as that which presents the topic of chief interest to our readers. Before proceeding to the analysis of it, however, we shall borrow from the second a detailed outline of the system of ecclesiastical government which prevails in Wirtemberg, and which is regarded in Germany as the most perfect development of the type on which all the churches of the Lutheran confession are constructed—the beau ideal, in fact, of Lutheran church order. Certainly, if a multiplicity of offices, and a consequently complicated system of operation, constitute the perfection of church government, our readers will learn, from the following detail, that they have only to go to Wirtemberg to behold the boldest approximation, at least, to such perfection, which has yet been made by any of the reformed churches.

1. *The Prince*, as bishop of the country. 2. *The Privy Council*, to which belongs the duty of deciding upon the weightier questions which may arise respecting the relation of the church to the state, of determining ultimately in any case of judicial accusation against the clergy on the part of the administrative offices, and of assuming the episcopal power in case of the prince becoming catholic. 3. *The Courts of Justice*. They have charge of matters relating to marriages; and in cases of prosecution of the clergy, with them lies the power of ordering the removal and punishment of the culprit. 4. *The Provinces*, with their important influence on ecclesiastical legislature and finance. 5. *The Supreme Study-Council*, (Oberstudienrath,) which superintends the theological seminaries. 6. *The Ministry for Church Affairs*, to which the Supreme Government-College, (Oberrieerrungs-Collegium,) in cases of weighty deliberation, is added. On this devolves the duty of protecting the church, and superintending it in the name of the bishop of the country; it is, however, entirely under the control of the minister for the time being. 7. *The Prelates or General Superintendents*, six in number. They visit, every two years, the deaneries of their diocese, pronounce upon the reports of the deans and clergymen for the Consistory, and meet with the latter yearly in a synod, in which the condition of the whole church is not only taken into consideration, but resolutions, both of a special and general nature, may be formed. 8. *The Consistory*, by which the subjects of education and ecclesiastical finance are superintended, care taken for the maintenance of the church-constitution, the ordering of the worship, and the continuance of the teaching, and watchfulness exercised over the appointments to office of clergymen and teachers by the prelates and deans. 9. *The Deans*, under whom, even in dioceses of from 15,000 to 20,000 souls, the whole of the churches and schools are placed, and who must visit personally every parish once in two years. They form the proper medium for the exercise of the collective government of the church, and have besides the power, in many cases, of joining as colleagues with

the secular officer of the district, as with the upper-bailiff, (oberamptmanne,) to constitute the upper bailiwick for the management of the ecclesiastical police, pauperism, education, &c., and with the supreme judge to constitute the supreme tribunal of the bailiwick, before which come matters relating to marriage, and in part to divorce. 10. *The Church-Convention*, consisting of the minister, the chief magistrate, and certain members selected from the political council, along with the accountant for the church. The business of this body concerns, besides the schools and the poor, all the ordinary affairs of the presbyteries. 11. *The Establishment-Council*, (Stiftungs-rath,) formed from the congregational council, under the presidency of the pastor. 12. Lastly, *The Pastor*, who, though the last member of this order, is, as respects the proper object of the church, the most important.

Such is the scheme of ecclesiastical order which obtains in the duchy of Wirtemberg. If political arrangement could secure the efficiency and well-being of the church, we might expect, under so thoroughly organized a scheme, where every interest seems to be provided for, and every emergency guarded against, a church endowed with all the life, purity, and vigor of apostolic days. Our readers, however, may suspect that, as the incorporation of worldly power with the church of Christ has invariably tended to the injury of the latter, in a spiritual sense, the more complete and minute any such system of ecclesiastical regimen may be, the more extensive will be the degrading and secularizing influence which it will exert upon the true well-being of the church. Of the justice of this suspicion, the state of things in Wirtemberg would seem to furnish a striking illustration. Though apparently a sorrowing, Mr. Wolff is an unhesitating witness as to the melancholy state of religious feeling and practice in the members of this elaborately-organized church establishment. "Whilst the external forms are carefully preserved," says he, "the Christian spirit has quite evaporated out of them, because committed to the keeping, not of the congregations with their ministers, but only of the secular and ecclesiastical officers of the state. Hence, in the lapse of time, the cosmo-political element has obtained such a preponderance in every department of the institution, that what is ecclesiastical can hardly any longer be called Christian; and the conceptions 'ecclesiastical' and 'Christian,' which, in idea, ought to be synonymous, are, in effect, widely separated from each other."

This is particularly apparent in the affairs placed under the management of the consistory, where "a rigid system of government, hardened in the forms of business, and demanding an unconditional obedience, such as proves destructive of the peculiar tendencies of a truly religious life in the church, is maintained, and would continue to be maintained, even though the persons administering it should apostatize from Christianity, and join the number of those who are the enemies of the cross of Christ."

Moved by the sight of these evils, and observing, at the same time, the very different state of things in those "pietistic conventicles" which

are entirely unconnected with the state, the author has been led seriously to question the wisdom of thus bringing the church into circumstances where her spiritual freedom is bartered for such merely worldly advantages as the state can bestow. He has asked himself, "Should a man really content himself with a church which apparently is held together by the mere power of the state, and the influence of custom? Can we hope to enjoy the spirit of Christ so long as our opponents can upbraid us with the fact, that it is the state which provides for the spiritual officers of the church by its money, and, by its oversight and discipline, keeps even the believers together? Or can we any longer console ourselves with the hope of the identification of the state with the church, whilst every day the separation between them is becoming greater, and the predominating spirit of both is daily growing more widely discordant? Would it not be better to bring the state to the conviction, that if our church is ever to recover her hallowed influence over the mind of the people, the spirit of Christ must be left to operate free and unhindered, and that, on the other hand, if exposed to the continued foreign influence of the state, she must gradually lose her internal union, and fall away into different dissenting sects? This much, at least, is certain, that if the state of religion and church order among us appear unsatisfactory, the fault lies, not with the gospel, which is for ever equally powerful, but with us, with individuals, and with the relations and arrangements by which the due development of the Christian life is checked or disordered, and the right and appropriate application of the powers actually existing is prevented."

For evils such as those which the author has pointed out, he can see no remedy but in the entire separation of the church from the state. These two institutions, he contends, are founded upon entirely different principles, and prosper best when each, keeping to its own proper sphere, leaves the others free from interference. To the defence of this position the greater part of his book is devoted. Unhappily, however, as it appears to us, instead of taking up the matter as a question of "What saith the Lord?" Mr. Wolf, like a true German, envelopes himself in a cloud of metaphysics, and labors to work out his proposition by certain *a priori* deductions from the conception (*begriff*) of church and state respectively. In pursuance of this plan, he endeavors to steer a middle course between the notion that the church is that, the full development of which will absorb the state, and the opposite notion, that the perfection of the church will be its annihilation by its absorption into the state—a notion which has lately found a very able and zealous advocate in Richard Rothe, a member of the Theological Faculty at Heidelberg.\* As might be expected, this mode of discussing such a question does not lead to a very satisfactory result. We fear, indeed, that like many of his countrymen, in a tking to metaphysics, the author has crossed the real bent of his nature, and sacrificed to the Time-spirit, of which Ger-

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\* In a work entitled "Die Anfänge der Christlichen Kirche und ihrer Verfassung," The Beginnings of the Christian Church and its Constitution. Wittenberg, 1837.



man writers speak so much, and which there are few of them who do not worship. Providence, we suspect, designed him to be a mere denizen of earth—plodding, pains-taking, to some extent vigorous, above all, sincere and earnest. But with this destiny he has not been able to content himself; as what German could? Like Peisthetairos, “the crow hath indicated somewhat to him above,”\* and therefore he must needs visit Nephelococcygia. We have no great inclination, we must confess, to attempt such flights ourselves; but having assumed the office of interpreting between Mr. Wolff and our readers, we must endeavor to follow him so far, at least, into the cloudy regions as to render into English his reviewer’s synopsis of his argument—in the main we think a sound one—against Rothe. Our readers will thus, at any rate, get a specimen of how a German mind likes to deal with such questions.

“He maintains that church and state are as essentially opposed to each other, as the kingdom of God and the world; that sin belongs to the very essence of that world within which alone the state has its existence and continuance; that consequently the world would as soon give itself up to the kingdom of God as the state would; and that, on the other hand, so long as the world lasts, the kingdom of God, in its essential opposition to the world, has no other problem to work out than how to *separate* itself more and more from the world, and more purely and perfectly to unfold its own proper form—that is, the church. In maintaining this ground, the author does not shrink from consequences. He even asserts that the morality of the state and the religion of the church have nothing in common. The former, in his view, is purely of a political nature, is mere legality, and rests solely on the compulsory obedience which has respect to the ordinances and laws of the government,—things of an overt character, which can have neither place nor influence in the church, where all actions must be prompted by inward conviction, and the mutual brotherly love of the members. Nay, he even goes the length of maintaining the ticklish doctrine that, as respects salvation through Christ, the morality of men is not to be considered, and that the moral man is really not nearer this than the immoral. Politics and Christianity appear to him things so utterly heterogenous, that the most excellent statesman, in spite of all his political success and services, may yet be a very bad Christian, and may incur the risk of ruining his political reputation, were he to act the diplomate on Christian principles.”

Dean Frey, in giving this synopsis of Wolff’s views, complains that he does not keep fairly to abstract reasoning, but descends to eke out his argument by an appeal to actually existing arrangements. This may be; but though we do not subscribe to all the sentiments contained in the above extract, it furnishes, we think, substantially, a very fair and sufficient reply to Rothe’s argument. That argument, as we un-

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\* Arist. Aves. v.50.

derstand it, is this : religion and morality are one and the same thing ; but the proper sphere for the perfecting of a man's destination to morality is society, which is also the proper province of the state ; consequently, it is only within the province of the state that religion, which is the proper object of the church, can flourish. As, therefore, the church extends its religion, it tends to perfect general society ; and, by consequence, the state, whose province that society is ; and so to prepare the way for its own entire absorption into the state. Now, to this piece of transcendentalism it does appear to us a very adequate reply to say that the morality which is sufficient for general society, and of which alone the state can take cognizance, is something very different from the religion which it is the design of the church to extend amongst men ; and that consequently, even supposing the state to arrive at its perfection, there would still remain much for the church to accomplish in her peculiar vocation. Still, of what use is all this speculation, either on the one side or on the other, as respects the question at issue ? Suppose we grant Rothe's theory—it still remains to ask, how does the fact, that the church is ultimately to be merged in the state, justify the state, in its present confessedly imperfect condition, in legislating for the church, and forcing it to work out its peculiar destiny by other than its own inherent powers ? May not this very interference be injurious to the state itself, and tend to prevent the Euthanasia of the church, by retarding the advance of both to that point, where the one is to be absorbed in the other ? On the other hand, suppose we adopt Wolff's view, and maintain the essential tendency of church and state to separate, to a greater distance, as each grows more into conformity with its formative idea, what good reason is there in this why the state should not interfere to regulate the affairs of the church ? Does it necessarily follow that an institution should contemplate exactly the same ends and tend to the same result as the general government of the country in which it exists, before that government can take any cognizance of its existence or operations ? On the contrary, does it not rather appear as if the existence of a difference, and still more, of a contrariety on these points, between a state and any institution existing within its jurisdiction, made it imperative upon the state to take that institution so under its charge, that no injury should result from it to the interests of the government ? And with respect to the question of *endowing* the church, seeing the church, in working out its problem of making men religious, directly benefits the state, by at the same time making its subjects virtuous, what is there in the mere fact, that the state is a worldly and the church a spiritual institution, to forbid the former attempting to secure to itself this great benefit, in an increasing degree, by facilitating the efforts of the latter ? To us it appears that these abstract reasonings do not touch the real merits of the question on either side. Had Wolff argued that the state, as an institution for certain specific purposes of human comfort, has no right to go beyond its sphere to meddle with purposes it was never designed to serve ; or that the church, as a spiritual institution, designed for specific spiritual pur-

poses, accept of the bounty, or permit the interference of the state, he would, we think, have come greatly nearer the mark at which he aims. Such modes of reasoning, however, we suppose, are too *factisch* to find favor with a true German theologian; though it is but fair to mention, that having indulged himself in this flight, our author follows it up with a sober enough exposition of the advantages which would accrue to the church if left unfettered by her connexion with the state.

When he comes to give utterance to his wishes for the future, we regret to observe that Mr. Wolff descends from the ground he had previously assumed, and, instead of insisting upon the entire separation of church and state, as the only radical cure of the evils of which he complains, as from his previous tone and remarks we were anticipating, he contents himself with proposing certain modifications and changes of the present internal state of the Lutheran churches, for "the purpose of affording greater scope to the religious feelings and sympathies of individuals, in the way of forming societies and meeting in conventicles"—a relaxation, in short, of the present system of rigid control and uniformity. "In place," says Mr. Frey, "of desiring that the church should break with the state, and form her new edifice on purely church foundations, which is the only thing to the point, the cautious and circumspect author, who seems to have a consciousness of the confusion and mischief attendant on such an experiment, only prescribes certain preparatory measures for the gradual attainment of his end. First of all, he demands full freedom for the unrestricted formation and internal unfolding of religious associations and unions. Next, he would have the rights of the deans and pastors—of whom the latter under the present system are the most efficient for purely Christian ends—greatly extended, so that they might secure these ends, both more widely, and more thoroughly, in regard to individuals in their congregations. Both of these proposals, however, are obviously dependent for their realization simply on the good will of the government; and when, consequently, they are avowedly urged, upon the ground that by means of them the ultimate separation of the church from the state will be accelerated, it is much to be doubted, especially in the present conflicting state of our political and ecclesiastical relations, and whilst the state is every day harassed by the strugglings of hierarchical assumption,\* whether such good will is to be hoped for, in which case the project will come to nothing, and all things remain as they are." In all this there is much sound sense; and the fate of Wolff's proposals will be nothing else, we are pretty confident, than the learned dean has predicted. That his conclusion should have been so impotent, after so bold a commencement, is to us, however, more a matter of regret than surprise, when we consider the grounds upon which he has supported his theories. When any question appertaining to the proper constitution of the church

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\* The allusion here is, doubtless, to the recent quarrel between the King of Prussia and the Archbishop of Cologne.

of Christ comes to be determined upon such purely philosophical principles as Wolff has sought to rest his argument upon, it is not to be expected that the conclusion will be urged to a practical issue with any great pertinacity or zeal in the face of strongly-opposing interests. Men are seldom very zealous for abstractions. A mere theory finds few martyrs. The displeasure of princes, or the risk of temporal loss, is not often incurred in support of opinions which are reached by mere processes of deduction from certain speculative ideas. It is only when we come to view certain doctrines and practices in the light of offences against sound morality and the will of God that we become sufficiently impressed with their inherent evil, to determine, at all hazards, to expose their enormity, and labor for their destruction. It was this view of the evils of the church of Rome which led to the reformation. It was this view of the iniquity of slavery which led to its abolition in the British dominions. It was this view of the grievances of dissenters in this country that brought on the repeal of the test and corporation acts, and the bill for catholic emancipation. It is this view of the evils of a civil establishment of religion, which is working in the minds of the opponents of such institutions in Great Britain at the present time, and urging them to such persevering and ever-increasing efforts for their overthrow. And it is only where such institutions are so viewed, as violations of the Divine plan, and encroachments on the high prerogative of Heaven, that men will gain sufficient stimulus to labor for their removal, against the otherwise resistless combination of wealth, prejudice, and power, by which they will be defended. Had Mr. Wolff taken his stand upon this ground, we have no doubt but that his assault upon the institutions whose evils he so strikingly depicts would have been maintained, both with more honor to himself and advantage to his cause.

It is occasion for serious regret, that in this respect our author is only a fair specimen of his countrymen in general. We see nothing in modern German theological literature more to be deplored than the unwillingness which, to a greater or less degree, even its most pious cultivators display, to bring all their opinions and controversies to the simple test of scriptural authority. A taint of rationalism adheres, almost unconsciously, to them, even in their most anxious efforts against that ruinous system. We know of none so free of this as Tholuck, Neander and Hengstenberg, especially the latter, of whose "English mind" and "rough occidental materialism"\* his countrymen sometimes complain; but even they might be better in this respect than they are. Oh! that men of their vast and well-stored minds were *thoroughly* possessed of the idea, that one clear injunction of the Divine Spirit is, to the true believer, of more and of more constraining energy than all the reasonings which the deepest thinker ever drew out of an abstract conception! Then might we hope that "the word of the

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\* Umbreit. "Studien und Kritiken," 1830. S. 13.



Lord would grow mightily and prevail" in that interesting country, for whose spiritual regeneration they have been already honored to do so much.

Meanwhile, it is pleasing to see that many meditative and pious minds in Germany are dissatisfied with the stiff, cold, and all-embracing forms in which the church in that country has hitherto lived, and are ardently breathing their desires for a state of things more in accordance with the internal purity and spiritual glory of the kingdom of Christ. Such aspirations are like so many tongues of flame, which gradually grow into each other, until a blaze be kindled, such as nothing can withstand. "Many pious and lofty desires and glimpses," says Jean Paul, in a sentence quoted by Dean Frey, "dwell for centuries in thousands of quiet hearts, and nought comes to pass but the opposite; till, at length, a Man grasps the club, and breaks open every bosom, and gives as much vent to heaven as hell has had before." Already, in regard to the freedom of Christ's church, glimpses of truth, and wishes for a better order of things, are settling down in many pious hearts; the man who is to give scope to them will also come in due time.

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## ARTICLE IX.

### LITERARY CHARACTERS OF GREAT BRITAIN AND IRELAND, DURING THE ANGLO-SAXON PERIOD.

From the *Archæologist*, May, 1842.

*Biographia Britannica Literaria; or, Biography of Literary Characters of Great Britain and Ireland, arranged in Chronological Order. Anglo-Saxon Period.* By Thomas Wright, M. A. London: Parker, 1842. 8vo. pp. 554.

WE slightly noticed the appearance of this important work in our last number. It is one which will entitle the society under whose auspices it has been produced to lasting praise. It is the more valuable, because no similar work has yet been published; and, in our opinion, it is executed in a manner which cannot fail to give general satisfaction. Mr. Wright has consulted the original sources of information, whether printed or in manuscript; every date and every fact appears to have been fixed with critical accuracy; and it is written in a style which will give it a good place among our national literature. We will only add that its extremely moderate price places it within the reach of every reader.

We are anxious to lose no time in giving a more detailed account of this volume, but we shall be obliged to content ourselves with a hurried and cursive notice. The lives are arranged in strictly chronological order: the plan, so far, is, that of the *Histoire Littéraire de France*,

but less discursive and more generally interesting. Each life is followed by a list of all the editions of the works of the writer who is the subject of it. At the end of the volume is given a bibliographical list of editions of anonymous books in Anglo-Saxon, and of works specially illustrating the Anglo-Saxon language and history, and a very useful index. The whole is preceded by an introductory essay on the state of literature and learning under the Anglo-Saxons. This essay had previously been published in a separate form.

Our readers will be better able to judge of the nature of this work by a few extracts, than by any general observations we can make upon it. The following account of the fate of the Anglo-Saxon Romances (so important a portion of their aboriginal literature) is taken from the earlier pages of the introduction :—

“ The only perfect monument of Anglo-Saxon romance, which the hand of time has left us, is *Beowulf*. In it we discover, what was rendered more than probable by other considerations, that, after the Saxons had embraced Christianity, they carefully weeded out from their national poetry all mention of, or allusion to, those personages of the earlier mythology, whom their forefathers had worshipped as Gods. But they went no further than this ; the subordinate beings of ancient superstition, the elves, nicors, and all the fantastic creatures of the popular creed, still held their places ; for the Christian missionaries themselves believed in the spiritual and unseen world as extensively as their converts. The only difference was, that, whilst elsewhere these beings retained very nearly their original form and character, in the minds of the monks they became so many black demons and mischievous hobgoblins.

“ That the early romances continued to be popular throughout the Anglo-Saxon period, is proved by many circumstances. Indeed their heroes were in most instances the direct ancestors of the Anglo-Saxon princes, and they must therefore always have been listened to with attention. Many of the nobles appear to have had such romances attached to the early history of their own families, as was the case with *Waltheof*. That they formed part of the poetry in which King *Alfred* from his youth took so much pleasure, is proved by the manner in which he introduces the name of *Weland*, one of the most renowned personages of the Teutonic mythology, into his translation of *Boethius*. The manuscript of *Beowulf*, and those which contain the fragments that remain of other romances, are all of the tenth century, the age in which chiefly the Anglo-Saxon vernacular literature was committed to writing, which shows that they were then popular. As late as the time of the Norman conquest, we are told of one of the companions of the Saxon *Hereward*, who had been named *Godwin*, ‘ because he was as valiant as *Godwin* the son of *Guthlac*, who was so highly extolled in the fables of the Ancients,’ a clear proof of their general popularity at that time. And at the same time, as we learn from *Hereward*’s anonymous biographer, there was one *Leofric*, ‘ his presbyter at *Bourne*,’ who seems to have still exercised in part the craft of the minstrel, or *scóp* ; for it was his occupation to collect the deeds of the giants and warriors out of the fables of the Ancients,

or from the accurate relation of others, for the edification of his hearers, and to write them in English in order to preserve them.' Leofric appears to have acted, in some measure, as the bard of Hereward's family.

"We not only trace the preservation of these romances down to a comparatively late period, but we can discover marks of their continued influence in various ways. From time to time we detect them interweaving themselves with the graver recitals of the historian. As the Saxons became in course of time more and more firmly settled in, and identified with, Britain, their recollections of their old country became continually less vivid, the traditions connected with it less definite, and they began to forget the meaning of many of the old legends, although they were still punctually handed down from father to son. In ages like those of which we are now speaking—indeed more or less in all ages—the popular mind ever connects its traditions with some object which is constantly before the eye, and thus the old romances were associated with new places. A particular tribe, who had brought with them some ancient legend, the real scene of which lay upon the shores of the Baltic, after they had been settled for a time in England, began to look upon it as a story connected only with the spot where they now dwelt, and to perpetuate the error by giving the name of its hero to some object in their vicinity. Thus came such names as Grimesby, in Lincolnshire, Wade's-Castle in the North, which took their names, one from Havelok's supposed foster-father, the other from a Saxon or northern hero, whose legend appears at present to be lost, although it was still preserved little more than two centuries ago. Thus, too, the legend of Weland was located in Berkshire. It was in this way that the Ongles, or Angles, settled at an earlier period near Sleswic, became by degrees confounded with the East-Angles in England; and thus the romance of Offa, one of the ancient Angle princes or 'heroes,' was, under the hand of the historian Matthew Paris, transformed into a life of Offa, King of the Angles in our island. Some such process seems to have produced the more modern romance of Havelok, that of King of Atla, still preserved in Anglo-Norman and Latin, though in either form inedited, and perhaps all the other Anglo-Norman romances which form the cycle commonly attributed to the period of the Danish invasions, such as Guy of Warwick, Bevis of Hampton, and King Horn. In more than one instance we find the events of some older family romance mixed up with the life of an historical personage. Such, no doubt, was the origin of the history of Hereward's younger days, which his biographer acknowledges to be taken from what appears to have been a poem, written by Leofric of Bourne; and there are several incidents in it which are most remarkably similar to some parts of the romance of Horn, just mentioned. These were not the most humiliating transformations to which, in the course of ages, the Anglo-Saxon romances were condemned; as they had been originally formed in the childhood of nations, so at a later period they reappeared in the form of chap-books and ballads for the amusement of children; and it is more than probable that the great god Thor, the never-ceasing enemy of the Giants of the old Teutonic mythology, has degenerated into that popular but no less remarkable hero of the nursery, the famous Jack-the-Giant-Killer, the all-powerful hammer and the girdle of

strength of the god having been replaced by the equally efficient sword of sharpness and the cap of invisibility."

After describing the Anglo-Saxon religious poetry, treating of the study of Latin and Greek among our early forefathers, and touching on various other topics, Mr. Wright gives the following curious observation on the forms of popular education at this early period:—

"It is singular enough, that most of the ways of giving a popular form to elementary instruction, which have been put in practice in our own days, had been already tried in the latter times of the Anglo-Saxons. We thus find the origin of our modern catechisms amongst the forms of education then in use. Not only were many of the elementary treatises on grammar written in the shape of question and answer, with the object of making them easier to learn and to understand, as well as of encouraging the practice of Latin conversation, but also the first books in the other sciences. We find this to be the case in many of the tracts written by Bede and Alcuin, as well as in those which were fabricated in their names. Afterwards, when in England the Latin tongue seems to have ceased to be to the same extent as before a conventional language among the learned, various attempts were made to simplify the steps by which it was taught. First, the elementary grammars were accompanied with an Anglo-Saxon gloss, in which, separately from the text, each word of the original was repeated with its meaning in the vernacular tongue; and then, as a still further advance in rendering it popular, the Latin grammar itself was published only in an Anglo-Saxon translation. We have seen the old Latin school-grammar pass through similar gradations in our own time. We owe to Alfric the Anglo-Saxon translation of the Latin Grammar, which, from its frequent recurrence in the manuscripts, seems to have been the standard elementary book of the day; and in the preface to that work he repeats the complaint, which had been made more than once since the days of Alfred, of the low state of Latin literature in England. Much about the same period came into use introductory reading books, with interlinear versions, which differed not in the slightest degree from those of the Hamiltonian system of the present day. A singularly interesting specimen of such books, composed also by Alfric, has been preserved in two manuscripts, and is printed in Thorpe's *Analecta Anglo-Saxonica*; the text, which is a dialogue between persons of different professions, is so arranged as to give within the smallest possible space the greatest variety of Latin words, and so to convey the largest quantity of instruction. This curious tract is valuable to the historian for the light which it throws upon the domestic manners of the age in which it was written. Among many other things, we learn that even the schoolboys in the monasteries were subjected to a severe course of religious service; and that the rod was used very liberally in the Anglo-Saxon schools.

"Amongst other Anglo-Saxon forms of instruction which have retained their popularity down to modern times, we must not overlook the collections of Arithmetical problems which are given in all our old elementary treatises, and are still to be found in such books as Bonny-



costle's Arithmetic. The Anglo-Saxons had a regular series of such questions, many of which are identically the same as those found in modern publications. This ancient collection is printed in the works of Bede, and again in those of Alcuin, but it is probably not the work of either of those writers. It is given anonymously in a manuscript in the British Museum, which is certainly not of a later date than the tenth or eleventh century. The first problem in the list is this:—The swallow once invited the snail to dinner: he lived just one league from the spot, and the snail travelled at the rate of only one inch a day; how long would it be before he dined? The following question, in various shapes, was very popular in our old school-books—Three men and their three wives came together to the side of a river, where they found but one boat, which was capable of carrying over only two persons at once; all the men were jealous of each other; how must they contrive so that no one of them should be left alone in company with his companion's wife? Again, An old man met a child, 'Good day, my son!' says he, 'may you live as long as you have lived, and as much more, and thrice as much as all this, and if God give you one year in addition to the others, you will be just a century old:' what was the lad's age? It may be observed that none of the problems in this collection are very complicated. The title, in some copies, tells us that they were made *ad acuendos juvenes*."

We will give but one other extract from the introduction, though we are tempted to multiply our quotations. It relates to the fate of the Anglo-Saxon language:—

"During the period of which any written monuments in the Anglo-Saxon language are preserved, extending from the eighth century to the Norman conquest, it seems not to have undergone any great change. But soon after the entrance of the Normans, its use as a written language was superseded, first by the Latin tongue, which, introduced by the foreign ecclesiastics, again took the station which it had occupied in the eighth century, and continued to flourish until the middle of the thirteenth; and secondly, by the Anglo-Norman, a Neo-Latin dialect, which was the vernacular tongue of the invaders, and was not laid aside until the beginning of the fourteenth century. It is probable that the Anglo-Saxon tongue preserved its purity until the beginning of the twelfth century; but it then began to experience the influence of the great political revolution which had been effected in England. It was by degrees subjected to a general organic change of many of its letters; syllables were cut short in the pronunciation; and the final terminations and inflections of words began to be softened down, until at a later period they were entirely lost. In the latter years of the Anglo-Saxon chronicle, which closes with A. D., 1155, we see that the language had already degenerated much from what it was fifty years before; and the change is still more apparent in the fragments lately published by Sir Thomas Phillipps. We have scarcely any other documents in the English tongue which can be ascribed with certainty to the twelfth century; but when we come to the age of Layamon, in the earlier half of the thirteenth, we find the transformation so complete, that it may be doubted whether the

uncorrupted language of the Anglo-Saxon writings could then be understood without much difficulty. During the thirteenth century, this organic change proceeded so rapidly, that there is quite as wide a difference between the language of Layamon and that which was written at the beginning of the fourteenth century, as there had been between the former and that written in the tenth, or as there is between the English language as written in the reign of Edward the Second, and the same tongue as we possess it at the present day. The form of our language during the twelfth and the first half of the thirteenth century is generally termed *Semi-Saxon*; from that period to the time of the Reformation it has received from modern philologists the name of *Middle-English*.

"The greatest destruction of Anglo-Saxon books happened during the numerous inroads of the Danes, from the ninth to the eleventh century, when so many of the richest libraries were committed to the flames, along with the monasteries in which they were deposited. Under the rule of the Normans, from the Conquest to the beginning of the thirteenth century, our old chroniclers relate many stories illustrative of the contempt with which the Anglo-Norman barons regarded the language of those whose rights they had usurped; but the more serious disputes related to charters rather than books, the latter (except when from time to time some English monk took them down) were allowed to lie neglected in the dust of monastic libraries, and the only losses which they sustained seem to have been the natural consequence of dirt and damp. But after this period the case was entirely changed, and, as they could no longer be read even by Englishmen, they had to suffer from various causes. A few monastic catalogues are still preserved in manuscripts of that age, and they contain the titles of many Anglo-Saxon books, which, however, are generally described as being 'old and useless.' Accordingly, we find that when the monks were in want of vellum, they scrupled not to take one of these 'old and useless' Anglo-Saxon manuscripts; and, having carefully scraped out the original letters, to make use of it for writing a new work, which they considered more important and necessary. One of these *palimpsests* is preserved in the Library of Jesus College, Cambridge, in which a splendid copy of the Anglo-Saxon Homilies of Alfric has been erased to make room for Latin decretals, although the destruction of the original was not so complete as to hinder us from tracing here and there a few words, particularly about the margins of the leaves. Sometimes, also, when the monks were at a loss for boards to bind their books, they took a few folios of these useless old manuscripts, and pasted them together; as was the case with the leaves discovered by Sir Thomas Phillipps in the covers of a volume preserved in Worcester Cathedral. The loss which Anglo-Saxon literature sustained by these means must have been very great. At the time of the Reformation, when, by the dissolution of the monasteries, their libraries of manuscripts were scattered in all directions, the number which perished cannot now be calculated, though the fragments which are found in the old bindings of books are sufficient to convince us that it was not small. The Anglo-Saxon manuscripts, however, suffered much less at this time than the others, owing to the eagerness of the Reformers to collect them; yet we still find a few fragments in the covers of books printed during the sixteenth century."

The lives of the Anglo-Saxon writers are arranged, as we have already stated, in chronological order. The first section includes a few names of British writers, who flourished, or are said to have flourished, before the Anglo-Saxon period, such as Gildas, Nennius, and St. Columbanus. We consider the article on Gildas as a specimen of accurate criticism; Mr. Wright has shown (we think there remains no further room for doubt,) that Gildas was a superstitious personage, and that his book is a forgery. We extract the account of Nennius, as being shorter, and equally characteristic :

“One name in the foregoing list of British writers, that of Nennius, deserves perhaps more notice than the others, because it is found prefixed to a book which is still preserved. The account which is commonly given of Nennius is taken almost entirely from two spurious prologues to this book, which, in all probability, are not older than the twelfth century, and from certain not very intelligible verses which are added to it in a manuscript of the beginning of the thirteenth century, preserved in the Public Library of the University of Cambridge. In the prologues he is made to describe himself as the disciple of Elbodus; whilst in the verses his master is said to have been Beulan, to whose son Samuel they are addressed.\* These indications would fix the age of Nennius to the beginning of the seventh century. According to Leland, he was abbot of Bangor, where he is said to have received his education: and escaping from the massacre of the monks in 603, he spent his latter years in the Scottish islands. The Welch antiquaries insisted upon a still more remote authority for the contents of the book which goes under his name: they said it was written by a Nennius who defeated Julius Cæsar in personal combat, and who compiled it in the British language from the traditions of the bards and priests; and that the second Nennius, the abbot of Bangor, translated the work of his predecessor, and continued it to his own time.†

“The book, however, to which the name of Nennius is prefixed, and which is a short sketch in British history, beginning with the fabulous account of the colonization of the island, contains dates and allusions which belong to a much later period, and carries with it many marks of having been an intentional forgery. The earliest manuscripts give it as an anonymous treatise. The name of Nennius is not joined with it until the beginning of the thirteenth century; and both then and afterwards it is as frequently given under the name of Gildas.‡ The attachment, however, shown to the number three, with some other peculiari-

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\* “*Versus Nennii ad Samuelem filium Magistri sui, Beulani presbyteri, viri religiosi, ad quem Historiam istam scripserat.*” This is the same Samuel whose name is given in the list above mentioned.

† “See Tanner’s *Bibliotheca* and Geoffrey of Monmouth. Bishop Nicholson speaks rather jestingly of Nennius and his book: *Historical Lib.* part I. p. 27. Gildas, also, was said by some Welsh antiquaries to have been educated at Bangor.

‡ “It is very singular that, in the Cambridge MS. already mentioned, the scribe has paid so little attention to what he was writing, that he copied this tract twice in the same volume, first under the name of Nennius, and afterwards under that of Gildas, as two different books.

ties, seem to prove that the compiler was, or at least wished to appear to be, a Welshman.\* He evidently intended that it should pass for a work written soon after the middle of the seventh century, and the narrative closes immediately after the death of Penda, king of Mercia, an event which occurred in the year 655. The outlines of the history which it contains are taken from the most common sources, but are disfigured partly by the compiler's ignorance, but much more by his prejudices; and they probably owe something to his imagination. In order, apparently, to fix with more precision the age to which it was to be attributed, a series of genealogies of the Anglo-Saxon kings was interwoven into the text, taken from tables which were brought down to a much later time; for, although it was evidently the intention of the writer to end with the kings who reigned at the period above mentioned, yet in one or two instances he has (probably by a mere oversight) passed the mark, and mentioned persons of a later date.† Thus, the genealogy of the kings of Northumbria ends with Oswin, who died in 670, and mentions his sons; and that of the kings of Kent is brought down to Egbert, who reigned from 664 to 673. In the genealogy of East-Anglia, the compiler has descended too low by one degree, closing the list with the son of Aldulf, who himself died so late as 713. But this mistake arose evidently from his not being aware of the length of Aldulf's reign, which began in 663. In his account of the kings of Mercia, this compiler seems to have had before him an original which he did not clearly understand, and his own table is so confused, that it is not easy to say where he intended to stop, but he has introduced the name of Egferth, who did not die till A. D. 795: and in a similar manner, in the genealogy of the kings of Deira, he mentions bishop Egbert, who died in 766. These two oversights seem clearly to show that the author of the book was writing at a later period than that of the man whom he wished to personate.

"This was observed by some writer who read his history, and who, to obviate the difficulty, added it to certain chronological notes, also pretending to come from the supposed author, who here declares that he wrote the book 796 years after Christ's passion, or, as he goes on to state, in A. D. 831. But this new writer seems to have discovered him-

\* "The frequent 'trilogies' in the work ascribed to Nennius have been pointed out by Lappenberg, *Gesch. von Engl.* vol. i. p. xxxix, and by Stevenson, in the introduction to his edition of it.

† We are inclined to differ with those who, because the genealogies are not found in the earliest manuscript, have supposed that they do not properly belong to the book, but that they have been added by some of the scribes, who copied them from another book. If this had been the case, the scribe would probably have copied the whole genealogies, and we do not think it likely he would have found MSS. wherein they were not brought lower than the seventh century. Some of those manuscripts which omit the genealogies, insert a reason for doing so: 'Sed cum inutiles magistro meo, id est Beulano presbytero, visæ sunt genealogiæ Saxonum, et aliæ genealogiæ gentium, nolui eas scribere. (See var. lect. in Stevenson's edit. p. 54.) This passage, from the hand of another intentional forger, proves that they were in the text before they were omitted, and reminds us of the old jest of Hierocles, how a *scholasticus* at Athens, when he received a commission from a friend to buy books, which he did not perform, excused himself by writing back, 'Your letter, in which you asked me to buy your books, never came to hand.' τὴν ἐπιστολὴν, ἣν περὶ βιβλίων ἀπαιτοῦσάς μοι, οὐκ ἔκομισάμην.



self exactly in the manner as his predecessor; for, in most of the early manuscripts which contain this chronological addition, it is coupled with a statement of the number of years that had passed since the creation of the world, which, according to the writer's own calculation, would bring us down to a much later period. These discrepancies puzzled the scribes of the different manuscripts now preserved; and by attempting to set them right, these have again introduced numerous variations in the dates. The oldest manuscript states the year in which this history was written to be A. D. 976, the fifth year of the reign of king Edmund.\*

"The tract which goes under the name of Nennius is, as might be supposed from what has been said above, of very little historical value; but it derives a certain degree of importance from those very parts which are least historical. The stories of the first colonization of our islands, of the exploits of King Arthur, and, above all, of Merlin and his wonderful birth and prophecies, which are not found elsewhere before the twelfth century, exercised great influence upon the literature of succeeding ages, and through it they have presented many mysterious questions to exercise the learning and ingenuity of modern historians. If the book could be proved to have been written previous to the Norman Conquest, it would support the claim of these legends to a Welsh origin. But the true date of its composition cannot at present be satisfactorily ascertained. The recent editor has, we think, been misled by the catalogue in ascribing the manuscript [MS. Harl. No. 3859,] which he follows, to the tenth century: it belongs, perhaps, to the beginning of the twelfth, but is hardly older than the latter part of the eleventh. The manuscript preserved in the Vatican is also attributed to the tenth century, but may, to judge by the fac-simile, have been written at a somewhat later period.† All the others, which are numerous, date from the thirteenth century downwards. No allusion to it, older than the twelfth century downwards, has yet been discovered."

The Anglo-Saxon period is one of the most interesting in the whole range of our literary history; and the present volume shows us how many great characters it produced. In the seventh century, Wilfred, busy in establishing in our island the authority of the pope; Benedict Biscop, introducing the fine arts from the continent; Cædmon, giving rise to the Anglo-Saxon Christian poetry; Aldhelm, the patriarch of

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\* "In this MS. the work is attributed to Marcus the hermit. Mr. Stevenson's supposition is extremely probable that this title originated in the mistake of some person who found it in the *Miracles of St. Germanus*, which are elsewhere told on the authority of a monk of that name. See the introduction to the last edition.

† "This MS., certainly the oldest known, seems to have been written abroad. The other early copy is also written in rather a foreign hand. This is a curious circumstance, and at least gives room for the question whether the book itself were not compiled on the continent—in Britany, for instance. It is a question of the greatest importance to the history of the middle-age romances. The book seems to have been made by one who was well acquainted with the legends which formed the ground-work of those romances, and attempted to mix them with the few historical notes of the history of the period which were to be found in common books as readily abroad as in England."

our more elegant literature ; Egwin, the first of our autobiographers. In the eighth century, Wilbrord, Boniface, Willehad, the apostles of the Germans ; Bede, the greatest of scholars ; Alcuin, the instructor of Charlemagne. In the ninth century, King Alfred. In the tenth, the great promoters of monarchism and of learning, Odo, Ethelwold, Dunstan, Oswald. At the beginning of the eleventh century, the Alfrics and Wulfstan, whose writings contained the doctrines of the Reformation. From the life of Cædmon, (the Anglo-Saxon Milton,) we extract the account of the last moments of this first of Anglo-Saxon poets.

“ The story of Cædmon forms one of those frequent episodes which give so much interest to the narrative of the venerable father of English historians. The account of the poet's death is singularly beautiful. ‘ When the time of his departure approached,’ says Bede, ‘ he was fourteen days troubled with bodily infirmity ; yet so moderately that during all that time he could both speak and walk. There was in the neighborhood a house in which they used to bring those who were very infirm and near their end. Then bade he his servant, on the eve of the night in which he was to leave the world, to prepare him a place of rest in that house ; whereupon the servant wondered why he gave this order, for it seemed to him that his death was not so near, yet he did as he had commanded him. And when, having taken their place there, they were speaking in joyful mood, and joking with those who had previously been in the place, and it was just past midnight, he asked whether they had the eucharist within. They answered, ‘ What need hast thou of the eucharist ? for thou, who art speaking to us thus cheerfully, art not now on the point of death.’ He said again, ‘ Nevertheless, bring me the eucharist !’ When he had taken it in his hand, he asked if they had all a placid mind towards him, without any enmity or ill-will. They all answered that they were most kindly disposed towards him, far removed from any angry feeling ; and they besought him in return that he would be kindly disposed towards them. He immediately answered, ‘ My dear brethren, I am kindly disposed towards you and towards all God's servants.’ And thus strengthening himself with the heavenly viaticum, he prepared himself to enter into another life. He asked again, how near was the hour in which the brethren must rise to sing their nocturns. They answered, ‘ It is not far to that.’ Then he said, ‘ It is well ; let us therefore wait that hour.’ And signing himself with the sign of the holy cross, he reclined his head on the pillow, and so in silence ended his life. And thus it was that, as he with pure and calm mind, and tranquil devotion, had served God, he in like manner, leaving the world by as calm a death, went to his presence ; and, with that tongue which had composed so many salutary words in praise of the Creator, closed his last words also in his praise, as he crossed himself and committed his spirit into his hands.”

The following sketch of Bede's scientific notions is a good picture of the state of knowledge in England previous to the twelfth century.

"The only scientific treatises of which we can with certainty regard Bede as the author, are those indicated in his own list of his writings. They are still preserved, and, though no better than compilations from other writers, and more especially from Pliny the elder, they exhibit to us all the scientific knowledge possessed by our forefathers, until a much later period. The tract *de Natura Rerum*, which was one of Bede's earliest works, and the Anglo-Saxon abridged translation, made in the tenth century, were the text-books of science in England until the twelfth century. The system of Bede was the same which had prevailed in Europe during several centuries. He considered the earth to be the centre of the universe; and he believed that the firmament was spherical, and bounded by, or inclosed in, fire, (*De Rer. Nat. cc. 4, 5*;) beyond this was the higher heaven, peopled by angelic beings, who were supposed to be able to take etherial bodies, assimilate themselves to men, eat, drink, and perform the other functions of human nature, and at will lay aside their assumed form, and return to their own dwelling place, (*ib. c. 7.*) He taught that the waters above the firmament were placed there for the purpose of moderating the heat of the fire and the igneous stars, (*c. 8*;) that the stars, with the exception of the wandering stars or planets, are fixed in the firmament and move round with it, and that sparks struck from them, and carried away by the wind, are what we call falling stars, (*c. 11*;) that there are seven plants, whose orbits are included in the firmament, and which revolve in the contrary direction to the motion of the sun, (*c. 12*;) that comets are stars produced suddenly, with crests of flame, and that they forebode political revolutions, pestilence, war, or great tempests and droughts, (*c. 24*;) that the different colors of the planets are caused by variation of distance and by the different strata of air in which they revolve, (*c. 15.*) Many of Bede's notions with regard to the planet which we inhabit were equally unscientific. He considered the earth to be a globe, (*De Rer. Nat. c. 46.*) but he did not believe in the existence of the antipodes, (*De Tempor. Rat. c. 32*;) he says that the earth internally resembles a sponge, and that earthquakes are produced by the sudden and forcible escape of wind confined in the cavernous parts, (*De Rer. Nat. c. 49*;) that the sea is not increased by the rivers which run into it, either because it is constantly evaporating into the clouds, or because the water descends continually into the earth by secret passages, (*ib. c. 40*;) that the sea to the north of Thule is a mass of everlasting ice; that thunder is produced by the sudden bursting forth of wind confined and compressed in the clouds, like the bursting of a bladder, (*c. 28*;) and that lightning is produced by the collision of the clouds in the same manner as fire by the striking together of flints, (*c. 29.*) He believed that the world was in his time in its sixth age—old, decrepid, and worn out, and that its end was near approaching, (*De Temp. Rat.*) In the treatise last quoted, (*c. 13.*) Bede gives an explanation of the Anglo-Saxon names of the months, which shows that he paid attention to the antiquities of the language and customs of his countrymen, and is a valuable illustration of Anglo-Saxon mythology."

We may observe that the list of editions of Bede is the most complete we ever saw. The life of Boniface is singularly interesting. We will extract from it the story of Bishop Gewilieh.

"Having entrusted to Sturm the foundation of Fulda, Boniface proceeded with his reforms in the churches of the Franks, and he now ventured to attack the persons of the chief supporters of the 'schismatic' party. A circumstance occurred at this time which gave him an opportunity of putting in force the canons promulgated by the preceding councils, and which affords a very characteristic picture of the clergy of that age. The sons of Charles Martel were engaged in continual hostilities with the German nations on their north-eastern border, who, after the death of Charles, had thrown off the yoke of the Frankish monarchs. Karlomann invaded Germany, with a powerful army in 742; in 743, the two brothers entered Bagoaria and defeated duke Odilo, when Karlomann, leaving his brother, turned his arms against the turbulent Saxons, and took the fortress of Hôhseoburg (Seeburg) on the confines of Saxony and Thuringia; in 744, Karlomann and Pepin invaded Saxony together, and reduced a second time the Saxon chieftain Theuderic.\* At the time of the first Saxon war, Gerold bishop of Mentz, who with his clergy had been driven away from that diocese by the incursion of the barbarians, accompanied the army of Karlomann, and was slain in battle. Gerold must have been one of the married prelates who shocked the zeal of Boniface, for his son Gewilieb held a high station at the court of Karlomann. Gewilieb, although a favorite courtier, and probably, like his father, married, was allowed to succeed to the bishopric of Mentz. This prelate attended the second expedition against the Saxons in 744, and when the hostile armies were encamped near each other on the opposite banks of the river 'Wisuraha,' he learnt that the slayer of his father was in the Saxon army, and he immediately sent him a challenge to meet on horseback in the middle of the river. When they came to the place of meeting, Gewilieb rode to the middle of the stream, and exclaiming hastily, 'Behold the sword with which I avenge my father!' thrust it through the body of the Saxon, who fell from his horse into the water. The disaster of their companion irritated the Saxons, whilst it encouraged the Franks, and was the commencement of a desperate battle, in which the latter were victorious. Gewilieb was allowed to retain his bishopric, for the nobles of Karlomann were of opinion that no man could incur blame for avenging the feud of his family.† But Boniface went to Mentz, and represented to Gewilieb the inconsistency of this conduct with the character of a Christian prelate, and in the year following, 745, he cited him before a council, which was probably held at Mentz. There, in addition to the charge of homicide and perhaps that of wedlock,‡ Boniface declared that he had himself seen him playing with dogs and birds, 'a thing by no means permitted

\* "Eginhard, Annal. ed. Teulet (Paris, 1840) pp 120—122.

† "Dixerunt . . . vicem reddidit patris morti. Presbyter Moguntin. Vit. Bonif. ap. Pertz. vol. ii. p. 354.

‡ "It is probably to him that the pope refers in a letter written about this time, Episcopus autem condemnatus, de quo inquisisti, qui pugnator et fornicator existit, atque res ecclesiae post degradationem sibi vindicare nititur, hic omnino respuendus est. Othlon. Vit. S. Bonif. p. 78. Gewilieb, after his deposition, appears to have retired to a church which belonged to himself. Presbyter Mogunt, p. 254.



to a bishop;\* and Gewilieb was deposed. His accuser, who had been ordained bishop and archbishop without any certain see, though he appears just before this time to have fixed himself at Colonge, was elected to fill the vacant bishopric, and from that time Mentz became the seat of an archbishop.†

Amid the ravages of the Danish wars at the beginning of the eleventh century, literature and science became almost extinct, and were only imperfectly revived by a few French Ecclesiastics brought in by Edward the Confessor. It was not till after the Conquest that they began really to lift up their heads; the twelfth century was the most brilliant literary period during the middle ages. It will be included in the second volume of the present work, to which we look forward as a still more important addition to our national literature. We can hardly doubt that the Royal Society of Literature will be supported by the public in this most praiseworthy undertaking: no person who possesses a library, be it ever so small, should be without the volume we have been reviewing.

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## ARTICLE X.

### REVIEW OF REVIEWS.

By the Senior Editor.

THE BRITISH CRITIC, AND QUARTERLY THEOLOGICAL REVIEW, No. LXII. APRIL, 1842.

THIS quarterly is especially, if not principally, valuable as an expositor of the peculiar views of the authors of the "Tracts for the Times." It, however, contains some discussions of high merit, as respects both style and matter, of which we have availed ourselves in former Nos. of the Eclectic. The No. now before us furnishes no article worthy of a place in our work.

ART. I. 1. *Essays on some of the Dangers to Christian Faith.*  
2. *The Kingdom of Christ Delineated in two Essays.* Such are the titles of two works recently published, the latter of which has been re-

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\* "Propriis oculis se perspexisse illum cum canibus avibusque jocantem, quod episcopo nullatenus liceret. Anon. Vit. S. Bonif. ap. Bouquet, tom. iii. p. 668. Hunting appears to have been a common practice of the bishops of this time, and is repeatedly provided against in the canons and constitutions.

† "The story of Gewilieb is given in the authorities cited above, and in Othlon. Vit. Bonf. p. 51."

printed in this country\* from the pen of *Richard Whately, D. D., Archbishop of Dublin*. To a review of these works, or rather to a discussion suggested by them, 48 pages are devoted in this article. The spirit and design of the review are sufficiently indicated by the following brief remarks with which it is commenced

“ One of the many difficulties which press upon us in the present most unhappy state of our church, is the question of the proper course to be pursued by churchmen when a bishop delivers, *ex cathedrâ*, doctrines which are in fact heretical. There is no difficulty of course when the points at issue are short of fundamental articles of faith; for silent submission to his diocesan’s will, supposing an injunction to have been laid upon him, is then the clergyman’s plain duty; nor again, in the case of *fundamentals*, is the difficulty one of *principle*, for learned persons tell us that, according to the uniform tradition of antiquity, even laymen have not the *right* only, but the *duty*, of contending for the faith openly and uncompromisingly, by whomsoever it may have been assailed, and under whatever circumstances. But the *when* and the *how* no doubt present matter for grave deliberation; and which, perhaps, at last, must be decided in each case, as it separately arises, by reference to its own peculiar facts. The volumes before us do not impose on us exactly the same difficulty, for though the substance of several essays would appear to have been pronounced by the archbishop more or less *ex cathedrâ*, still by the form which they have assumed in publication, he seems to descend from that position, and enter the lists as a private combatant, claiming and entitled to no other deference than the established courtesies of controversy demand for every writer who comes before the public; while the very openness of his character forbids us to imagine that he can wish, after having so done, to fall back upon exemptions which would be refused in other circumstances, or wish to shelter himself under his character of archbishop from those comments which must naturally attend his character of author.

The review, however, is far from being satisfactory to us. Its positions in respect to the connexion of the church with the civil magistracy, are such as no party in this country would dare to assume.

ART. II. This article is a review of a late work by W. H. Mill, D. D., on the *attempted application of Pantheistic principles to the Theory and Historic Criticism of the Gospels*. The principles referred to are those of Dr. Strauss of Germany. The following remarks are extracted from the preface of Dr. Mill, respecting the work of Dr. Strauss. “The italics,” says our reviewer, “which are partly our own, will direct the reader’s attention to what we mean to make the main business of the present article.

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\* By Wiley and Putnam, New York, 1842. This American edition is accompanied with a commendatory preface by the Rev. Dr. Skinner, and has met with a flattering reception. It is regarded by us as a most valuable and seasonable publication, the British Critic to the contrary notwithstanding.

"There is not much in his elaborate work of critical or philosophical moment, of which the processes have not been visible to *inquiring eyes, as working in somewhat less suspected channels before* ; his peculiarity is not so much originality of matter as what we may term, in common parlance, the thoroughgoing style in which he carries out his conclusions. Now the same kind of advantage which a physician obtains from a disease coming to a crisis, is derived from this unsparing method, to the defender of the Christian cause. The full, fairly stated development, at all hazards, of the rationalist principle, that *the miraculous must be fabulous*, may help to prevent the adoption of an intermediate state of sentiment in the Gospel story, in which the disease of infidelity exists, *as really, though not as strikingly*, as in its extreme manifestation, and in which some might be induced to acquiesce even from a knowledge of the existence of Strauss' strange hypothesis, without the powerful reasons for an opposite conclusion, which the actual survey of his grounds and method would supply."

The reviewer proceeds to delineate seriatim what he calls the "Pantheistic Tendencies of the age, and of the Theological teachings of many writers in the English church ;" and makes many remarks which are valuable in themselves. But whether they are justly applicable in the directions intended, may well be questioned. The *tendencies* against which his remarks are aimed, he finds in almost every thing which is truly Protestant in doctrine and reasoning, and admits no middle ground between German rationalism and the superstitions of the Romish faith, at least that portion of them which are embraced and defended at Oxford. This review, however, aside from its pervading tendency to Oxfordism, contains many just and sensible remarks. It is extended to about 20 pages.

ART. III. We have here an article of 42 pages on the "Elizabethan Poetry," chiefly the *Sacred Poetry of the Seventeenth Century*. This discussion too, as is the case with almost every thing which appears in the British Critic, is made to contribute to the support of the peculiar views of the "Oxford Divines." It especially commends and inculcates the "Catholic tone of piety which remained, [in the poetry of the Elizabethan age,] as a noble relic of the old world," [the world before the Reformation,] and claims for it, a decided preference over "the daring spirit of resolution and confidence which was the first produce of the new." There is, however, much that is valuable in this article, well worthy the attention of those who are inclined to study the steps by which the modern literature of Europe made its first advances towards the elevation which it has attained.

ART. IV. *The Remains, and Occasional Publications of the late Rev. John Davidson, B. D., formerly Fellow of Oriel College, Oxford, 1841.* The review of this work is extended to 35 pages, and contains much in high praise of the originality, intellectual strength, and moral worth of the writer. All this is well. But as his works are comprised

in a single volume, and are confined to few topics, they are rather to be received as indications of what he might have accomplished, had his life been spared and his circumstances favored, than as containing any thing at once important and complete. Mr. Davidson lived about a century ago, and his Remains, though especially interesting to his successors at Oxford, cannot be expected to attract much attention beyond the sphere of his life and labors.

ART. V. This article,—27 pages—is a review of several late publications, which may be denominated in general, “*Tales for Young People*.” Such is the running title of the article, which is written in an off-hand and readable style, and contains many sensible remarks and discriminating principles, as well as some lively and interesting specimens of parental instruction and children’s talk, selected from the books under review. Our readers are so familiar with this kind of writing, that it would appear supererogatory to give them large extracts, and we will only transfer the following from the writer’s introductory remarks.

“In defiance of common sense, and of no end of proverbs to the same effect in everybody’s mouth, men will go on with great expectations and little ground for them; planting a fir and looking for an oak, building a conventicle and then mightily disappointed that it does not turn out a cathedral. With respect to our own works the case may sometimes be different; but with respect to our neighbor’s doings we are perpetually wondering that he, good man, does not accomplish a great deal more, though he has done every thing that could reasonably be expected of him, and ten times more than he in his modesty ever supposed he should be able to do. It is some unreasonableness of this kind, and nothing better, that has made many a man called a moralist, to hang over several well-meant and well-executed works of literature, with a much more crooked nose and temper than ever his right mind or his natural expression would warrant. Things may be light in name, and humble in their pretensions, and yet for all that have very grave and good effects. At all events it is one of the most absurd, as well as the least amiable follies, to undervalue things little or great, and not at all times to be more than well content with reason and realities. If a man tells us that salmon are not taken in a trout stream, nor elephants bred in a meadow, we owe him nothing at best: but if by this information he means to put us out of humor with either our meadow or our stream, we owe him a grudge. In like manner, supposing many of our lighter works, story books for example, do not in reality effect any great or lasting good, one would like to ask the person who makes much of the supposition, what does do good according to his magnificent scale? Whether he thinks he has an eye that can be trusted to see whence good always comes, and how much comes at a time? One would put him upon considering, whether experience does not show a great deal to convince us that but little matters constantly come of great ones, and considerable things of very small. Thus much we can say, that such considerations have commonly satisfied those who were blessed with a right judgment and a cheerful temper to follow it, to take things that are well intended for what they are meant; and to rejoice in their



way and in their turn over a tale or a song, just as we do over an insect or a flower.

"But what if we say the truth, and declare that with respect to most people we cannot possibly bring ourselves to rate the influence of books of any sort high. Men are not only improved and perfected, but from beginning to end they are formed and trained chiefly by action. Nay, there seems little reason to doubt that the abundance and variety of books in one age leave the mass of mankind little better off for any thing like wisdom and virtue, than a positive dearth of them in another. We see not indeed how the incessant and hurried coursing of other men's thoughts through the mind is ever even to equal in fertility a little quiet stream of one's own.

"But whatever the case may be with respect to what are commonly called more serious books, we are well persuaded that comparatively lighter ones, written with the same good intention, which by the by are much harder to write, are sadly undervalued. We are not inclined to dispute that a series of essays or a volume of sermons may go much further in tearing up error by the roots and in planting truth in its stead. These may do more work and deeper, and no doubt are necessary in their way; but practical people must be aware, that truth established in this manner, is commonly established in more senses than one; it hardly ever gets out of such books with any force, at least into young and common minds. Or supposing that what is ever so well and gravely written is really understood and appreciated by many, nevertheless it is notorious how almost insuperable the difficulty is people find in bringing what they have learned to bear upon what they should do, so as to do it with any tolerable grace and consistency. Who has not observed a thousand times, that in the mere maxims of common prudence, the man who perhaps has pondered over them most, is more at fault than other people when his turn comes to be prudent. A week spent with people of good sense, and in a well ordered family, will give him much more useful understanding of his duties, and at the same time will get him into an easy and pleasant way of doing them. This is the fact upon all matters of importance and at all times; but it is especially applicable at present, when many most important principles of truth and conduct are as it were only now being recovered to life and practice again. Hence, it need not surprise us, if very convincing works upon such matters apparently produce no great results, if generally speaking those who read them seem content with understanding and being convinced. Or, supposing they go about acting upon them, they can scarce do it other than awkwardly, so that the very things which they would recommend are rather for a time put out of countenance than encouraged by what they do. For hope what we may, there is hardly such a thing as doing what should be done, simply from having learned what it is, and that it ought to be done. By a gracious providence, therefore, children are put to school under a different discipline, so that they shall learn infinitely more from their parents' ways than words; and in like manner, and by the same high appointment, Christians too are or ought to be trained by the Church. That is to say, truth and goodness to be disseminated must be seen at work, faith must be learned by obedience, and obedience itself by entering into all the details of Christian life and practice.

"For reasons like these we cannot help attaching much more than common importance to good books of an easier and lighter kind, provided the goodness is not chiefly in the story, but in the fitness of that story to teach what is good, and most of all what is good for existing times and circumstances."

ART. VI.—This article is purely Theological. It is a review of *Four Sermons preached before the University of Oxford*, by Charles A. Heurtly, B. D., on the *Union between Christ and his People*, and lately published. We have first a brief analysis of the Sermons, which, on most points, appear to be of a highly evangelical character. The reviewer concludes his analysis with the following paragraph:—

"Our duties resulting from this communion are, the author considers, as to the Church in general, to look on her interest as our own, 'to strive to bring all men to the knowledge of the Saviour,' 'to discharge each our several offices with truth and faithfulness;' as regards our fellow Christians on earth, love, sympathy, and succor. As to the faithful departed, he enforces the duty of remembering the 'dead in Christ,' and thanking God for his grace bestowed on them; but on the whole, though with caution and reserve, he declares against prayers for the dead."

He then adds, in a note:—

"Though we of course differ from Mr. Heurtley on this head, we do not think it can be fairly denied, that, on the whole, the general bearing of the New Testament would, unless interpreted by the Church's practice, lead to his conclusion. At the same time we cannot think he allows sufficient weight to 2 Tim. i. 16—18, which passage has certainly an incomparably more natural appearance on the hypothesis of Onesiphorus's death than otherwise."

The object of the remaining portion of the article is to show, that though Mr. Heurtley claims no alliance with the peculiar views of late put forth at Oxford, he does really agree with both Oxford and Rome, excepting that he has not dared to express his views with the same boldness and candor. The reviewer, however, has failed, we think, in some degree, to make this apparent. But it is enough for us to lay before our readers his own statement of his position and object. It is as follows:—

"We gather from his preface that Mr. Heurtley thinks himself to see in certain writers in our Church who have lately been the subjects of very free and general criticism, a 'tendency to push particular portions of truth out of their position;' and he speaks more plainly of essential error in the Church of Rome. Both of these remarks, we infer, he intends to apply in their measure to the subject of his present volume; we shall then be able to afford him pleasure and relief, (for so eminently loving a controversialist as Mr. Heurtley's sermons show him to be, must always rejoice in finding fresh objects of sympathy,) should we

succeed in showing that upon these subjects neither Oxford nor Roman theologians differ essentially from himself."

ART. VII.—We have here an article of 26 pages, on Church Architecture, preceded by the titles of several late scientific works on the subject. It is accompanied with a number of wood engravings of open roofs, fronts, &c., and is a discussion of interest to such as are especially concerned with such matters.

ART. VIII.—The running title of this article is *Palmer on Protestantism*. It is a review of two pamphlets by William Palmer, M. A., of Oxford, lately published. The first of these was occasioned by the recent establishment of the bishopric in Jerusalem, and is mainly occupied with facts bearing on the state of Protestant bodies abroad, and the other with deducing from those facts what he regards the natural inference as to the relation of the English Church to such bodies, and as to the manner in which they ought to be treated by churchmen. He does not "give up," as our reviewer remarks, "the foreign Protestants, without supposing the case of individuals among them still uninfected with latitudinarianism, whom he specially hails as brethren in the faith, and fit for our communion whenever they claim the privilege." Such is the extent of Oxford charity, and much of this sort is put forth, with vast self-complacency, in the course of this article of 35 pages. But we have only room,—nor do we think it important to add other extracts,—to lay before our readers the introductory remarks of our reviewer, which show the views entertained at Oxford as to what constitutes heresy.

"It is commonly and very truly remarked, that modern heresy has varied considerably from heresy in ancient times; that, in compliance with an altered state of general feeling and philosophy, it has shifted its ground, and developed itself in a deeper and more subtle form. While the former was almost universally *dogmatic*, the latter is in the main *latitudinarian*. The former, at each period that it arose, denied the orthodox doctrine on some particular point, and set up a doctrine of its own in opposition to it; the latter neither denies the orthodox doctrine, nor sets up any counter doctrine of its own, but contents itself with allowing a perfect liberty of choice between the one and the other, with putting all doctrines on an equality, and making it, so far as orthodoxy is concerned, a matter of indifference which one we adopt, or which we reject. This is in reality the theory which commonly goes under the name of the *right of private judgment*, or the *right of every man to think for himself*, or the *right of the individual to form his own belief upon his independent examination of Scripture*—modes of speaking which, though sufficiently expressive to startle any true churchman, still keep back and conceal in some degree the ultimate consequences of the principle they contain, and are therefore often used ambiguously by persons who would shrink from those consequences, were they fairly and broadly stated. And yet the slightest examination of such forms of expression show them hardly one remove from the strongest statement of

the theory. Whoever asserts his right to examine Scripture for himself, and to build his own belief upon that examination, cannot of course question the right of his neighbor to do the same; nor, however he may disagree with the conclusion that the latter may arrive at, can he stigmatize it as heterodox. Whatever it may be, it has precisely the same authority and sanction as his own, the authority and sanction of individual opinion. Neither assertor can claim the superiority; for one individuality cannot be weighed against another. Thus no opportunity is given for interference, no opening by which authority can slip in; and therefore like two parallel straight lines, like two circles that cannot touch, the two individual beings must forever continue in a state of absolute equality and independence, evolving their reasonings, as the planets execute their orbits, clear of all contact, and secure and unapproachable in their own lines. A man may opine according to this system, but cannot dogmatize; he may disagree, but he cannot condemn: for he is met forthwith by the unanswerable defence of—I think otherwise, and my opinion is as good as yours.

“Such is the groundwork of the latitudinarian theory, and it is very evident that though it admits, in some cases, of a nearer apparent approach to the orthodox doctrine than the old heresies allowed, it is in principle far more destructive and more irreconcilably at war with revelation than they were. The old heresies maintained particular false doctrines; this theory maintains no doctrines whatever: the former asserted the necessity of belief in their particular creeds, however erroneous: the latter puts aside the necessity of any one belief altogether. It is, to use Mr. Palmer’s words, ‘not so much any particular or accidental heresy, as *heresy itself made into a principle*,—not so much any particular false doctrine which implies an act of *αἵρεσις*, as the *principle* of *αἵρεσις* itself; as if a man, besides his particular moral delinquencies, should base his moral action on the *avowed principle* that it was right to follow particular appetites in despite of the general or catholic law of conscience and reason.’ And mark the necessary result of such a system, with respect even to the individual’s belief in his own opinion. Let a man adopt any set of opinions in the strongest way compatible with this system, how can he be said fairly to believe in them, when he acknowledges another to have precisely equal grounds for believing the contrary? And the more deep and philosophical the person who holds the theory, the more must he recognize this consequence of it, because the more strongly must he perceive that one man’s individuality is as good as another’s, and that therefore he has no right to attach any superior weight or sanction to his own. Such a theory does immediately and directly overthrow Christianity, denying, as it does, the positive truth of its doctrines, and dissolving its one true faith into a thousand faiths, neither true nor false, because they are not faiths but *opinions*, and are *entertained* only, not *believed*, by those who hold them.

“And this rejection of doctrine, we must remember, is not a rejection of a merely positive part of the system, a rule or ritual, an accidental appendage, an ordinance which we see as a matter of fact to be imposed upon us, and which therefore it is our duty to submit to, simply because it is imposed. Undoubtedly it is to give up all this, but it is to give up something far higher as well. The dogmatic principle is of



*the very substance and essence of Christianity, and absolutely required by the whole analogy of the dispensation. What is the great object of Christianity but the union of mankind in one body, the Church, under one head, Christ? Fallen men have only their self, their individuality, to rest upon; they are isolated, disjointed, separate pieces of a yet unformed system. Christianity perfects their existence by bringing them together, by making them parts of a whole, members of a body; and thenceforth they exist, no longer as individuals simply, but as a body. And therefore such language as expresses the actions and motives of mere individuals is no longer applicable to them: they cannot think for themselves, or form their own creed, which would be to fall back upon that self which their higher nature has absorbed. As members of the Church they can have no creed but the Church's creed, can believe no otherwise than as that body, with which they are strictly and absolutely one, believes. To talk now of man's private judgment, and individual rights, is in fact to undo all that has been done, to resolve the whole into its parts again,—the fragments of humanity which had been collected and formed into a perfect body, to their original decomposition and nothingness; the note which had united all the voices under heaven in one clear determinate tone, into that infinity of discords and abortions of sound out of which it was created. Miserable philosophy indeed, and almost Pagan blindness, does it seem, to insist so peremptorily upon a return to the melancholy privileges of the individual man; as if solitariness, isolation, and division were our glory, and that state of union, which, as the Spirit is the *Spirit of Unity*, is in fact identical with, and what we mean by the spiritual state, were nothing more than a slavery and a burden. But this is what is necessarily done when we deny dogmatism. What is a dogma, but simply the belief of the body, as opposed to that of the individual; the result arrived at by the whole, thinking and speaking out as a whole, instead of the result arrived at by the parts, thinking and speaking out for themselves. And dogmatism is the imposition of that dogma; there is no more control or domination implied in it, than what a higher nature necessarily has over a lower; a perfect organization over an imperfect; the body over the members; the whole over the parts; man united over man separate; man renewed over man fallen; the spiritual over the natural; the heavenly over the earthly; the living over the dead. And therefore submission to the Church's dogma is no more than one of those many Christian acts, whereby the individual abandons his lower carnal nature, or his self, for his better life of unity and love. Such faith places him in a glorious state, as far above the uncertainties and wanderings of the individual mind, as revelation is superior to reason, and grace to nature. It is in this state only that we claim and enjoy our Gospel privileges; for of what an excellent character is the gift of the Bible, if we have no means given us by which to understand or interpret it! 'If the trumpet give an uncertain sound, who shall prepare himself for the battle?' The Bible shut up in an unknown tongue would only inspire feelings of vague reverence, or excite the intellectual curiosity that glories in starting at a disadvantage, and measuring the shrewdness of its conjectures by the difficulties of their subject matter. To give up the one sense of Scripture which the Church teaches, is ultimately almost to give up the*

light of revelation itself, and to reduce man again to the guidance of natural reason ; for though it leaves a divine book in his hand, it refers him entirely to human reason for the explanation of it. The words he reads are heavenly, but the sense he fixes upon them is the result of the mere exercise of his natural powers of mind. He wants the *dogma*, the Church's traditional divinely inspired *sense* of the Bible, to make it really a revelation to him. This one sense embraced, does, in reading the Divine word, what the eye of taste does in beholding a majestic building—unfolds to us the secret beauty, depth, and harmony of the Divine scheme."

ART. IX.—*The Works of Nicholas Ridley, D. D., some time Lord Bishop of London. Edited by the Parker Society.* This work, and the Sermons, &c. of Archbishop Sandys, edited by the same Society, are here made the subject of a review of 36 pages. The editions are said to be the most perfect which have been published of these works, but the topics dwelt on by the reviewer are not such as would be generally interesting to our readers.

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THE QUARTERLY REVIEW, No. CXXXVIII. MARCH, 1842.

ART. I.—This article, of 49 pages, is preceded by the titles of several collections of French Memoirs, comprising in all more than 150 volumes. The writer, however, selects a single volume as the subject of his review, that of Jules Quieherat, on the history and character of *Joan of Arc*. The leading details of the story of this truly extraordinary woman are presented, as we think, with discrimination, and some facts are brought to light never before associated with her history. The review forms an interesting narrative, and we would lay it before our readers entire, had not our space been occupied with selections, as we have judged, better adapted to the design of our work. We must be contented, therefore, with adding to what we have, the closing paragraphs of the review before us, in which the writer's judgment of the character of Joan is fully expressed.

"From the preceding narrative it will be easy to trace the true character of Joan. A thorough and earnest persuasion that hers was the rightful cause—that in all she had said she spoke the truth—that in all she did she was doing her duty—a courage that did not shrink before embattled armies, or beleaguered walls, or judges thirsting for her blood—a serenity amidst wounds and sufferings, such as the great poet of Tuscany ascribes to the dauntless usurper of Naples :—

'Mostrommi una piaga a sommo 'l petto  
Poi disse sorridendo: Io son Manfredi!'

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\* Dante, *Purgatorio*, Canto iii,

—a most resolute will on all points that were connected with her mission—perfect meekness and humility on all that were not—a clear, plain sense, that could confound the casuistry of sophists—an ardent loyalty, such as our own Charles I. inspired—a dutiful devotion, on all points, to her country and to God. Nowhere do modern annals display a character more pure—more generous—more humble amidst fancied visions and undoubted victories—more free from all taint of selfishness—more akin to the champions and martyrs of old times. All this is no more than justice and love of truth would require us to say. But when we find some French historians, transported by an enthusiasm almost equal to that of Joan herself, represent her as filling the part of a general or statesman—as skilful in leading armies, or directing councils—we must withhold our faith. Such skill, indeed, from a country girl, without either education or experience, would be, had she really possessed it, scarcely less supernatural than the visions which she claimed. But the facts are far otherwise. In affairs of state, Joan's voice was never heard; in affairs of war, all her proposals will be found to resolve themselves into two, either to rush headlong upon the enemy, often in the very point where he was strongest, or to offer frequent and public prayers to the Almighty. We are not aware of any single instance in which her military suggestions were not these, or nearly akin to these. Nay, more, as we have elsewhere noticed, her want of knowledge and of capacity to command were so glaring, that scarce one of the chiefs, or princes, or prelates, who heard her in council or familiar conversation, appears to have retained beyond the few first days the slightest faith in her mission. At least they regarded her as a useful tool in their hands, from the influence which they saw her wield upon the army and the people. And herein lies, we think, a further proof of her perfect honesty of purpose. A deliberate impostor is most likely to deceive those on whom he has opportunity and leisure to play his artifices, while the crowd beyond the reach of them most commonly remains unmoved. Now the very reverse of this was always the case with Joan of Arc.

"The fate of Joan in literature has been strange,—almost as strange as her fate in life. The ponderous cantos of Chapelain in her praise have long since perished—all but a few lines that live embalmed in the satires of Boileau. But, besides Schiller's powerful drama, two considerable narrative poems yet survive with Joan of Arc for their subject,—the epic of Southey, and the epic of Voltaire. The one, a young poet's earnest and touching tribute to heroic worth—the first flight of the muse that was ere long to soar over India and Spain;\* the other full of ribaldry and blasphemous jests, holding out the Maid of Orleans as a fitting mark for slander and derision. But from whom did these far different poems proceed? The shaft of ridicule came from a French—the token of respect from an English—hand!"

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\* "The Vision of Kehama," and "Roderick the Last of the Goths." We have lately read "Joan of Arc," revised, in the collected edition of Mr. Southey's poems, of which it forms the first volume. In his preface, dated May 10, 1837, he has these words,—and few, indeed, are they who will read them unmoved:—"I have entered upon the serious task of arranging and collecting the whole of my poetical works. What was it, indeed, but to bring in review before me the dreams and aspirations of

ART. II.—*Organic Chemistry, &c.* See Article VI. in the present No. of the Eclectic.

ART. III.—*Rienzi and his Times.* By Dr. Felix Papencordt, Hamburg, 1841. The review of this work occupies thirty-four pages of the "Quarterly," and relates many curious facts of the parentage and life of this great hero of history, biography, tragedy and romance, derived by Papencordt from sources and documents before unpublished. But as the whole would be uninteresting excepting to the antiquary and the scholar, so it would be difficult to give any just idea of it by any quotations which we might make.

ART. IV.—*Jesse, Kohl, and Sterling on Russia.* Such is the running title of this article, of thirty-nine pages, which is preceded by the titles of three works by the writers here named. It is enriched with copious extracts from the narratives under review, and is by no means an uninteresting article. But we have published so much on Russia, in the course of our selections that we forbear to entertain our readers with any of the varieties which are here clustered together.

ART. V.—We have here an article of 22 pages reviewing several late works, relating to improvements on a number of the estates in England, and *Scottish Fisheries*. It is the continuation of an article in the London Quarterly of December last, which we noticed in our Review of Reviews, vol. iii. p. 380. As we then remarked, the subject of the productiveness of fish ponds and fisheries is one of great interest with political economists in England. We are here told of the great advance made within the last thirty years in the wealth of some of the principal estates in Scotland, as well as in the comforts of the people by their removal to the sea-coast for the purpose of procuring an important part of their living from the produce of the waters, while their highland farms which are vastly better adapted to grazing, than to grain, have been devoted to wool-growing, and are thus rendered sources of increased profit to the proprietors. At some future day this subject may become one of interest in our own country. But at present, we have little need of the application of these principles of economy, either to our population or the means of supplying them with a comfortable subsistence.

ART. VI.—*Arundines Cami*, collected and edited by Henry Drury, A. M., 1841. Just 30 pages are here devoted to a review of this little volume, which is a collection of translations of Latin poems written by some of the most distinguished scholars and statesmen of England,

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my youth! Well may it be called a serious task, thus to resuscitate the past. But serious though it be, it is not painful to me who knows that the end of his journey cannot be far distant, and, by the blessing of God, looks on to its termination with a sure and certain hope."



in their youth. The subject is of course interesting especially, if not exclusively, to the friends and countrymen of the writers.

ART. VII.—This is an article of 79 pages on the Divines of the Church of England of the seventeenth century. It is the closing article of this No. of the "Quarterly," and is written with considerable ability. The writer disclaims all intention of entering into personal controversy on any of the points of dispute now agitated in the English church. Yet he does not affect indifference to these points, but rather than meet with new arguments the peculiar views maintained in the Oxford Tracts, he chooses to oppose them with the views of those divines, who formed the body of standard theology, which has been acknowledged by the Church of England generally, since the Reformation. This he does in respect to numerous particulars, and accompanies his statements with copious extracts from the writings of the divines referred to. The general design of the article is sufficiently indicated by the following remarks :

"It pleased God that in England two distinct developments of two seemingly distinct principles should be brought close together, and exhibited to the eyes of the Church—the excesses of Popery which brought on the Reformation; and the excesses of Puritanism which produced the Rebellion; and that from the oscillation thus caused both the Church and the State should right themselves at the Restoration.

"Not only this spectacle, but the lengthened struggles of our Church against the Jesuits on the one side, and the Nonconformists on the other, placed full before her view both the extremes which endanger truth and goodness, whether in religion or any other duty. They placed her also in the position most favorable for the formation of a sober, watchful, and discriminating temper; where, instead of leading on a charge and attack in one direction, at the risk of intemperance and incaution, she was compelled to defend a post; maintaining her ground against opposite adversaries, and so brought to scrutinize every weak point, and to weigh every movement, lest success in one part should hazard loss in another. Her great theologians of that day were also matched directly with the most learned and acute defenders of popery. They came to the contest, not, as too many of the present day must come, from a life of thoughtlessness, armed only with weapons snatched up in haste for the emergency, with fragments of Fathers picked up in pamphlets and reviews, but from years of deep and patient study. There is no appearance of shifting their ground, as if they began the controversy in twilight views of truth, and changed as it dawned upon them farther. On the contrary, the uniform definiteness and consistency of their teaching throughout is most remarkable. Again, there is no symptom of combination, as if they derived their opinions from some one modern teacher, instead of by independent study from the great fountain-head of Scripture and antiquity. They were, almost without exception, placed in high official stations in the Church; where every word was open to attack, and required to be weighed; and every act was to be determined under a most solemn responsibility; and in which their prayers and

holiness may well entitle us to believe that they were blessed with no common guidance from their Lord and Master. All were to a singular degree, practical men, not pledged to any theory; and by the circumstances of the times and of their lives, brought into contact with the realities of life; and saved from the infection of that 'disease,' which Lord Bacon has so well described as naturally seated in Universities; by which one kind of persons are led to delight 'in an inward authority, which they seek over men's minds, in drawing them to depend upon their opinions, and to seek knowledge at their lips;' and another sort, 'for the most part men of young years and superficial understanding,' are 'carried away with partial respects of persons, or with the enticing appearance of godly names and pretences.'

"And if they defended the system of the Church of England with their understandings, they realized it in their lives. There is a longing in this day for the rise of some light of surpassing holiness within the Church of England, such as we are wont to dream of in the monasteries of former times: and this would be willingly accepted as a proof that, amidst all the dangers which seem to threaten our Church as a system, and the defects which may disgrace some of its individual members, yet we still have life within us, and need not seek for any outward change to assure us of the favor of God."

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THE EDINBURGH REVIEW, OR CRITICAL JOURNAL, No. CLI., APRIL, 1842.

ART. I. The title of the work placed at the head of this article is, "*The German Nations Considered as Individuals*," 2 Vols. Tubingen, 1841; but the running title of the article itself, of 48 pages, is *France, America, and Britain*. These three nations the writer compares in what he considers their leading characteristics, and illustrates the same by a review of their conduct towards each other, as well as in respect to other civilized nations, in the differences which have arisen to disturb the peace of Europe, and to interrupt the friendly relations of England and the United States from the date of the independence of the latter to the present time. The discussion is able, and presents some considerations worthy of the attention of the governments and people of the several countries. But to many of our readers, they would not be new, and on this account we have not thought it best to transfer the whole article to our pages. We confine our extracts therefore to a few remarks of a more general character, which are at once important and indicative of the character and design of the whole discussion. The following are a part of the writer's introductory observations.

"Until within a very short period, the conduct of a nation, as a nation, depended principally on the accident of the character of the king or of the minister. A succession of warlike kings made Denmark a military power; a succession of quiet half-witted sovereigns reduced her to political nullity. Under Richelieu, France was intrigu-

ing and ambitious ; under Fleury, she was careless and pacific. But now, that in almost every country the people interfere in public affairs, often direct them, and almost always influence them, the conduct of a nation must always be affected, and often is governed, by the general disposition of the millions who constitute it ; it becomes a permanent reflection of the national character, and is tinged with all the peculiarities with which climate, race, religion, institutions and past history, have colored that character. In former times, the conduct of a nation could be best predicted by considering the feelings and habits of the individuals who presided over its councils. The principal elements of such a calculation are now drawn from the character of the people itself. Our ancestors at one time feared the ambition of Louis, and at another relied on the courage of Frederic. We dread the ambition of France, and rely on the prudence of Prussia.

"The most remarkable exceptions to this rule are to be found in Russia and Austria. The conduct of each of these empires has often appeared to depend on the peculiarities of an individual. The death of Alexander, and the succession of Nicholas, altered the whole tone of Russian politics—they are still affected by the personal dislike of Nicholas to Louis Philippe ; and the prudent and pacific behavior of Austria, is mainly attributable to the wisdom of Metternich. But this is accounted for when we recollect, that Russia and Austria are the empires least affected by the popular voice. In both of them, as far as foreign relations are concerned, the people are nothing—the government is every thing. On the other hand, in the three great countries which enjoy the most popular institutions—the British Empire, France, and the United States of America—the character of the government for the time being, has, under ordinary circumstances, little influence on the public conduct of the nation. A vain, or a rash, or a litigious, or a procrastinating minister, may indeed bring either of them into difficulty ; but if the nation do not share his faults, he will be driven from power, and a successor appointed for the express purpose of retracing his steps. Of course, we do not mean to affirm that the public conduct of any of these communities is uninfluenced by the personal qualities of the statesmen for the time being in power ; especially if those qualities are, as was lately the case in France, and perhaps in the United States, an exaggeration of the national peculiarities ; but we affirm that those qualities, though not positively, are comparatively unimportant. In short, that whereas formerly the character of the minister determined the conduct of the nation, now the character of the nation determines the conduct of the minister.

"For the purpose both of estimating the future prospects of the civilized world, and of deciding what ought to be the course of our own policy, it is therefore important to consider what are the characteristics by which these three great powers are distinguished in their public conduct towards other civilized states ; in order that we may ascertain the chances of peace, and the means by which it may be promoted—and the chances of war, and the means by which it may be averted."

The following from near the close of this article will show the general conclusions of the writer.

"We shall close our view of the three great nations whom we have compared, by some remarks on the degree in which the character of each seems to deteriorate or improve. During the present century the influence of the people on the public conduct of America, France, and England, has been constantly increasing. In each of these countries the forms of government have become more and more liberal, and public affairs have excited among the people more and more attention. During that period, almost every state composing the American Union has approached nearer to a pure democracy. France has acquired a representative system; and the constituency on which it is founded, narrow as it is, has been progressively enlarged. The Government has been more and more under the influence of the Chamber, and the Chamber under that of the electors. Napoleon was more independent of public opinion than Louis, Louis than Charles, and Charles than Louis Philippe. In England, the growth of the towns, and of the commercial and manufacturing interests, has enabled them to measure their strength with the aristocracy—to effect a revolution, which, though tranquil, has been real—and to conquer an influence, which, though its progress is irregular, and from time to time apparently checked, must ultimately predominate. Under such circumstances, the public conduct of a state becomes a better and better index of the character of its population.

"We regret to say that the character of America seems to deteriorate. She appears to us to become more captious, more litigious, more rash, and, we fear, even more ambitious, as her power advances. And when we consider the probable magnitude of that power at no distant period, the possibility that she will abuse it is a source of alarm, both for her own sake and for that of Europe. As far, however, as European interests are concerned, it must be recollected, that every abuse of her power by America has a tendency to check its growth; and that, if ambition were to seduce her into prolonged war, or to an extension of territory much exceeding what are now her acknowledged limits, the probable result would be, that she would be dissolved into independent, and rival, and frequently hostile states, less beneficial to mankind than if she had remained one pacific empire, but certainly much less formidable.

"In the public character of France we see little change. Her ambition, her thirst for admiration, her indifference to the means by which it is to be obtained—perhaps we might say her desire to be admired rather for her courage than for her forbearance, rather for her power than for her justice—her want of faith and of candor—the unreasonableness of her resentment, and the fierceness of her hate—have been as conspicuous during the last few years as during any portion of her history.

"England is still very different from what we could wish her to be; but she is improving. Her feelings have been more decidedly pacific—her sympathy in the welfare of other nations has been stronger—her resentment less readily roused, and more easily appeased—and her whole conduct has been more disinterested and more prudent, during the last twenty-five years, than during any other period of equal length for a hundred years past. We trust that an extension and improvement of education, commensurate with the increased influence which the body of the people are acquiring over her Councils, will improve her good dispositions; that the reform in her Tariff, which the public voice demands and



must obtain, will direct her commerce towards the more civilized portion of her European neighbors; that increased intercourse will produce more community of feeling and opinion; above all, we trust that she will escape the great corruptor—war; that she will have no victories to inflame her passion for military glory—no defeats to make her timid—and no disgraces to wipe out.

“With respect to her conduct towards the two nations with which we have compared her, we hope that when any differences arise between her and America—and differences must constantly start up where there are so many thousand miles of contiguous frontier—she will instantly endeavor to have them referred to arbitration. It is scarcely possible that states, so litigious as America, and so self-confident as England, should ever convince one another, or agree as to a basis of compromise;—even supposing, what never will be the case with respect to England, that each government had leisure and patience to understand the matter in dispute. A controversy attempted to be carried on direct between Downing Street and Washington, lingers on from year to year—sometimes apparently forgotten, and sometimes apparently on the brink of adjustment—but with a constant tendency in each party, at every renewal of the discussion, to become more acrimonious and more obstinate. With respect to France, we hope much from the Commercial Treaty, of which even the details have long been arranged—which each Government has long been anxious to sign—which is demanded by the departments—and delayed only in fear of the Journalists of Paris. Commerce, manufactures, and the desire for individual advancement, may, in time, direct to peaceful pursuits the restless ambition and vanity which now seek to be gratified by participating in the general glory of the nation. But while we desire to have with France as much of commercial intercourse as is possible, we desire to have as little as is possible of diplomatic intercourse.”

ART. II. *The Glacier Theory.* See Article I. in the present number of the Eclectic.

ART. III. Thirty-five pages are here devoted to a review of the government reports on education. The piece is characterized with the spirit of local politics, and would be uninteresting to most American readers.

ART. IV. *South Australia.* This article of 23 pages is an able and satisfactory refutation of what is called the Wakefield theory of colonization to South Australia, but the subject is not one of much interest to this country, and could not be placed fairly before our readers in any reasonable space.

The remaining articles in this No. of the Edinburgh—articles V, VI, and VII—are on *Moore's Poetical Works*, the *Ministerial Budget of 1842*, and a review of *Frederic the Great and his Times*, by T. Campbell, Esq., on which we have no room for remark.

## ARTICLE XI.

DR. E. G. CARUS, OF DRESDEN, ON THE GOLDEN ORNAMENTS DISCOVERED IN A NUBIAN PYRAMID, BY DR. FERLINI, OF BOLOGNA.

Translated from the *Jahrbücher der Literatur*, by the Junior Editor.

On the 22d of April, 1841, when returning from Florence, I spent a day at Bologna, intending to enjoy myself in examining the splendid collections of Prof. Alessandrini in Comparative Anatomy. About mid-day, after having been present at a session of the Academy of Sciences, and been much delighted with an interesting essay of Prof. Calori, I visited some galleries of the arts; and among others, I was invited to see a collection of antiquities, which a physician of Bologna had brought from Egypt some four years previous. That it was a physician who had made these collections of course excited my interest more, and I consented to go. Dr. Ferlini himself was not at home. The door was opened by a young black, whom he had also brought with him. I first saw a small number of stuffed Egyptian animals, not very rare, also oriental weapons and utensils; but then a very remarkable collection of rich golden ornaments, together with the model of the pyramid, in which this exceedingly valuable treasure had been discovered. The sister of Dr. Ferlini—an amiable, refined lady—made her appearance, and very kindly explained the several pieces of the collection, and obliged me, by obtaining for me a small quarto volume, in which her brother had given an account of his researches, and of this important discovery, and represented the most remarkable things by engravings. The title of the book is: *Relation Historique des Fouilles Opérées dans la Nubie*, par le Docteur Joseph Ferlini, de Bologne, Rome, 1838.

The treasures collected here have not failed to attract the attention of antiquarians, the more, as not many other travellers, fitted out with abundant means, and furnished by governments for making investigations—as for example the learned Rosellini—have succeeded in discovering any *golden* articles of importance. His Majesty the King of Bavaria has even purchased a part of Ferlini's treasures, at a great price, for the München Gallery. Yet it was not all this that especially interested me in this discovery; it was the *psychological view* of it.

The following communications translated from his own account cannot fail to excite the interest of our readers.

“Ever since my residence in Greece and Egypt, I have had the idea of making some discovery or other useful to history. With this intent I sought to gain the good will of the Governor. After some months, the occasion offered of asking his permission to make researches in places where old monuments existed. The Pacha was surprised at my request, and set before me all the dangers to which I would be exposed in such an undertaking: he also informed me that, although he

gave his consent, he would only allow me to go to work on my engaging to pay the laborers; and that I ran the risk of losing all the savings of four full years of labor. He advised me to be satisfied with what I had, and assured me that I exposed myself to certain death by my covetousness, as the blacks whom I must employ were so wicked and cruel that, in case they discovered any thing valuable, I might be assured that they would circumvent my life in order to possess themselves of my treasures. Finally, the Governor said to me, that as he had no great authority in the desert through which the road to Sabdarad lies, he could give me no perfect guaranty of my safety. When, however, the Governor saw that his remarks made no great impression on me, he promised to grant my request, as soon as another physician should supply my place. When I heard that my successor had set out from Cairo, I called to see Mr. Anton Stefani, an Albanian, and communicated to him my intention, for he was better acquainted with the country than myself, having been transacting business in it for fifteen years. I promised him half of the profits of our discoveries, gave him 400 Spanish dollars, and sent him to Musselamiah to buy camels, cords, corn, leathern bottles, and instruments necessary for grubbing. Musselamiah is a large village, three days' journey from Cartum, in the interior of the peninsula, where a market is held weekly. I bought large stores of meat, and, according to the custom of the country, I cut it into slices and hung it in the sun to dry.

"I took thirty young, resolute fellows into my service, and promised each one two Spanish dollars a month and his expenses. Fourteen days after, Stefani came with 27 camels, victuals, and instruments. We now only awaited the arrival of my successor Mr. Gallina, who came on the 10th of August, 1834. The next morning, I sent the camels, hired men and some slaves by land, and embarked on board a vessel with Mr. Stefani and our families.

"After three days' journey, arrived at Vod-Benaga, I sent my companion to the Turkish Governor of that village, who lived in Sendih, to preadmonish him of the permission granted me by the Pacha. The Governor ordered all the authorities of the towns to allow me to pursue my investigations undisturbed wherever I pleased, and immediately fixed the price which I must give the laborers, because hitherto nothing of the kind had been undertaken in his district. Our families we left in Vod-Benaga. We hired our men, provided ourselves with water and victuals, and set off to the desert called Galah-Volet-Mamouth, eight hours from the Nile, where there is a beautiful temple, whose exterior is covered with hieroglyphics. We spent the first day in making strong enclosures of thorny boughs, to protect ourselves from the lions which inhabit these desert regions. On the following morning, we examined the exterior of the temple more accurately, and as it was half-covered with the sand, I tried to remove this with baskets made out of ox-hides, which I had provided at Vod-Benaga. We commenced taking off the sand from the eastern side, in hope of finding the entrance; but without avail. Then we went to work on the principal façade but our

labor was no more successful. After that, we began to work on the western side, but seeing no prospect of reward for our toil, we desisted entirely from this undertaking.

"We were, indeed, driven to this by many other weighty reasons. Five of our camels had died, the rest were sick, tired and worn out, by the long marches they were obliged to make to the Nile; the water and the provisions were spoiled, our men had the colic, and a small negro, son of a slave, who prepared our scanty meals, had already died. We, therefore, set off and went to Volet-Ahsan to find less dangerous quarters, and at the same time were two hours nearer to the Nile. Here we found another, but smaller temple than the first. We again first made a hedge of thorns to defend us from the lions, which impelled by hunger, roared every night in our vicinity. I then began to examine the temple, but, after three days, found that we would not be in a condition to endure so toilsome a life, without good food and fresh water. As we felt unwilling to labor longer without success, and so expend our money, we returned to our families. The next day we received, in our tents, the visits of a large number of the inhabitants of the neighboring villages, who came to beg us for work. We gave to each the fifteenth part of a dollar. Their animals furnished us with water, whilst our camels went to the Nile, where they found fat pastures to renew their exhausted strength. At Vod-Benaga there are many upright pillars, ruins of an ancient temple of very rude workmanship. I sought out that part which had served the ancients for a place of burial, and, as soon as I discovered it, commenced my operations. I first found a large vestibule, like the subterranean galleries of the Roman catacombs. This vestibule had a circumference of many fathoms, and contained a number of well-closed burmæ—a kind of vases of burnt clay, which the blacks still use to carry water to their houses.

"The discovery of these vases awakened great wonder among the workmen, who expected to find gold in them. In order to correct this mistake, I took up one of them in my hand, and threw it on the ground so as to break it in pieces. It contained nothing but earth kneaded with water. I examined this earth, in hope of finding in it an amulet or a scarabæus: I found nothing either in this, or another I broke. I made a final search at the bottom of the gallery, and saw, by the light of a lamp, in a sepulchre of the depth of several feet, some dead bodies, which had nothing remarkable about them, except the one that lay in the midst of the rest and underneath a stone: this one had a sabre on one side, the lance on the other, a bow and arrows. Scarcely had I touched it before the oxydized weapons crumbled to pieces, except some arrows, which were covered with a kind of plating. I took up these relics, which seemed to me interesting.

"After some days of useless toil, I concluded to commence digging in the town, in which I had found some ruins of pillars, and there I also very soon discovered a splendid four-sided pilaster of red granite. Each side was three fathoms high, and a half fathom in width. About



one-third the way up, the pilaster was girt around on every side with a band of hieroglyphics, which included various symbolical figures. On one side, we saw two men and a woman, all unclad; on the next side, two other figures, and so on the two remaining surfaces, except that the forms were different. As it was impossible to transport this huge stone on the backs of our camels, I tried to have the lower part broken off, so as at least to secure the hieroglyphics, but the granite was so hard, that I failed in the attempt. Then I wished to have at least a pretty large piece of it, and endeavored to cut it off with the saw and water, but was only able to make a superficial incision. I was now obliged to desist from this undertaking, and made over this pilaster to the chief of the town of Vod-Benaga, whom I directed not to pass it out of his hands, without my order. I afterwards made a present of it to Mr. Minaut, the French Consul at Cairo.

"Whilst pursuing our investigations, we discovered a place paved with red bricks, in the centre of which stood a pillar. This building had probably been a dwelling of some Egyptians, as it had the diminutive form of the present houses. I found there a small mask cut out of jet, which I took with me. Further on, we discovered a red granite, like the former, but larger and better hewn. I again directed to cut into it. At length we found a temple in ruins, whose ornaments had been destroyed by the savages. Here ended our search, the unsuccessful results of which were neither sufficient to defray our expenses, nor in the smallest degree to compensate us for our toil. We therefore proceeded no farther in our investigations at Vod-Benaga, left the town and went to Begaraviah where are the great pyramids. I had long had the intention, in these solitudes, the seat of ancient greatness, to seek out some monuments, which would tend to illustrate the history of this interesting portion of the world, which hitherto had been investigated only by Belzoni and myself.

"We pitched our tents in the vicinity of the village of Begaraviah, which is not far from the Nile, and hired some negro-huts. A part of our men we set to work to make some baskets out of ox-hides, suitable for carrying earth. The rest of the slaves must remain to tend the camels. Then we proceeded to the pyramids, which we saw at the distance of an hour.

"We first passed through the old city of Méroé, which is almost enveloped in sand, where we only found some sphinxes of black granite, much damaged and partly destroyed. Not far from the town, we saw many single pyramids falling to pieces, and in the neighborhood a hill, whose summit was crowned with twenty-one pyramids, which on the principal side especially were in ruins. But a single one was still comparatively uninjured. East of this, we found eight smaller ones, very well preserved. At the foot of the hill there were yet others, smaller, which were uninjured only on the portico or sanctuary adorned with hieroglyphical inscriptions. Here I would begin my labors, but my friend, Mr. Stefani, induced me first to make yet another attempt in the town, which lay in the vicinity of the avenue of the sphinxes.

Four days after our arrival, we made an encampment and obtained laborers from the Sheik or master of the village. At first they came reluctantly, fearing they would not be paid, but afterwards so many offered, that we were obliged to send them back. We commenced our grubbing on a kind of habitation, which seemed to have been destroyed by human hands. We found there an ichneumon of serpentine, and a head of a mace, overlaid with a blue enamelled coating. In vain did we search in hope of finding something costly; we must go farther. I left Mr. Stefani, and took a hundred men with me to search the great pyramids. Some days later, my friend discovered another larger habitation, but without any gain, for he found nothing in it, but a small idol-image of burnt and glazed earth. Meanwhile I had grubbed through the ruins of a small pyramid lying at the foot of a little hill. When I reached the bottom of the hill, I found that it consisted of black slabs of stone, which seemed to have been laid there by human hands. I tried to go deeper by the help of the pick-axe, and after having removed a little earth, I plainly saw a step; it was the first step of a stair-case, which had been laid in the interior of a monument. After this step, I uncovered a second, third and so forth. The night came on and obliged us to rest from our labor; but the next day I sent for Mr. Stefani, his men and the Arabians with him; in all we amounted to 350 persons; exactly the number of men we employed to dig out the earth and carry on the work. The Arabians, who saw very well that we daily paid our men—a thing to which they were not accustomed—were now eager to pitch their tents in the vicinity of the scene of labor. These tents are made out of long twisted straw, and called, by the Arabians, *Vir*s.

“By degrees I cleared off the stair-way, and came to the ninth step, which was the last. It led to a small vaulted grotto, where I first saw only the bones of camels, horses, and other smaller skeletons, which I took to be dogs. Then I found two different kinds of saddles, one appeared to be the sumpter-saddle of a camel, the other a saddle for a horse; and finally, some metallic articles, which looked like little bells, on which were engraven birds and deities.

“At the bottom of the grotto, I saw a large stone, which formed the entrance into the sepulchral monument; I had it removed, and found an oval opening wrought out of the rock by means of the chisel. It was filled with kneaded clay, which I had dug out and taken away. But in this opening the heat was such, and the dampness too, that the workmen, although used to very great heat, could not remain more than five minutes in the grotto. I let them alternate. After we had entirely cleared out this burial-place, I found opposite the entrance, a tomb similar to the one just described. It contained a number of human bones piled up on one another, but among them no weapon, nor any other ornament whatever.

“During this time, Mr. Stefani, who had been busy about removing another pyramid, had only reached the portico; some days after, however, he succeeded in finding the stair-way to the vaults. Among the dead bodies, was one covered with a stone. They were digging under on the head-side, to get the stone away, when one of the workmen, in strik-

ing with the mattock on a round body, about the size of a ostrich-egg, brought out a number of things of glass, of a solid, white, and transparent nature.

"Whilst Mr. Stefani superintended this work, I had searched through the fallen pyramids, without any fortunate results, however, as I only stepped on a block of stone of the portico, which had two figures ensculpured on it.

"It will, perhaps, be a matter of wonder to most, that I pursued my researches with so much patience and perseverance, in the very uncertain hope of seeing any fruit of my labor. I honestly confess, that I was often deeply distressed, when, after long days of toil, I returned, with my friend, to my tent, and the laborers, who followed us, leaping and howling fearfully, held out their hands to demand the price of labor, which I must consider lost. Besides that, our food was horrible; think of our constant night watches—Mr. Stefani and I were under the necessity of watching half the night in turns, fearing the infidelity of our men, and the cruelty of the negroes—in order to preserve our lives against the snares which might any moment beset us; then intolerable heat, and finally, the apprehension of losing, in a moment, all prospect of a successful issue of so expensive an undertaking, which I had prosecuted with the greatest perseverance. It must be confessed, that these circumstances were well fitted to sink a stronger heart than mine; they at least wrought so upon me that I was on the point of abandoning my plans. But when I saw the workmen grubbing away with the utmost endurance, on their miserable fare, with only the hope of a little gain, I took courage again, and even to such a degree, that I concluded *either to return home without a sou, or as the owner of a treasure*. And so, when I had grubbed away fruitlessly on one structure, I went again at another.

"When Mr. Stefani had finished his labors in the pyramids, I proposed to him to make a beginning elsewhere, between the village and the pyramid on the west, where are the ruins of an old town on a hill. This, however, issued in nothing favorable; but the natives encouraged me by the assurance, that they were certain, from an old tradition of their country, that there were treasures concealed there, worth more than forty ardebs of gold—each about 4000 Livres.\* In this declaration, however, I only perceived their intention to induce me to pursue my searches, in order to furnish these wild men money and the means of living; and I was the more confirmed in this view, as Mr. Stefani's efforts were again fruitless; for he found nothing but a wooden figure, the right side of whose face, and whose right arm were painted half red.

"Nor had I better fortune than my companion! For I searched through the fourth pyramid, without finding anything important. As I went off, however, I discovered a large mass of sapphire-like chalcédony, extended conically, and broken at the extremities.

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\* Even this tradition is a very remarkable fact.

"Disappointed at the fruitlessness of my labors on the small pyramids, I concluded to make a last attempt on one of the large ones, at the termination of the hill, and particularly on one that seemed to me yet untouched. This was the same pyramid, which Mr. Caillaud of Nautze describes in the account of his journey to the white and blue river. It is therefore unnecessary for me to detain my readers by a description of this well known, beautiful monument; I shall only remark, that it consists of 64 steps, each a half fathom high, so that it had an altitude of 32 ells, or 28 metres. Each side was about 48 ells long, therefore 1764 square-metres ground-plat. When had I ascended, with four men, to the top of the pyramid, in order to commence work, I saw at once that the disruption of it would be very easy, as time had already asserted his rights on it. After the removal of the upper stones, I encouraged my workmen anew, and whilst the stones of the steps were being thrown down, as I could no longer bear the heat of the sun, which had reached an altitude of 48 degrees, I went with Mr. Stefani, to rest in the shade of a neighboring pyramid. All at once I was called by my faithful servant. I immediately ascended the pyramid again with my friend, and felt my heart leap with joyful expectation. When lo! I beheld my servant lying prostrate, and covering the aperture which had just been opened. The blacks, prompted by covetousness, attempted to kill him by violence, and thrust their avaricious hands into the bottom of the opening. We stood over against them holding fast, and, with weapons in hand, compelled them to descend. We now called our other servants, on whom we could depend, and bade them proceed with the work in our presence.

"This aperture disclosed to us a wide room, containing things, which we could not yet distinguish. It was formed of large stones, irregularly disposed. We threw off the largest that covered the upper surface, and discovered a cell of an oblong square form, built of large stones piled on each other, which made the four sides corresponding with the steps of the pyramid. This cell was four feet high, and from six to seven long. The first object we observed, was something covered with a web of cotton of glistening whiteness, which, scarcely touched, crumbled into dust. It was a kind of table or altar—*mensa sacra* or, *ara domestica*—supported on four pillar-like feet, and surrounded by an ornamental border, consisting of higher and lower wooden lattices. This lattice-work was carved, representing symbolical figures. Under the table was a bronze vase, containing the valuable articles of the discovery, golden bracelets for the arms, rings, scarabees, amulets, buckles etc., which were enveloped in cotton similar to that just described. Near the vase, on the bottom of the cell, were disposed neck-bands of regularly mixed threads, imitation jewels of glass, colored stones, etc. I also found some talismans, little idols, a cylindrical casket of metal, small boxes turned by the lathe, filled with a pulverized substance, the analysis of which I shall give again, a saw, a chisel, and various other instruments.

"I then put all these things away in small leathern sacks, and thus



prevented the Arabians from seeing the gold. After coming down from the pyramid again, the laborers all pressed around me to see what I had. But I showed myself resolute, and seizing my weapons exhorted them earnestly to proceed in their work. As soon as the blacks saw my weapons, they retreated immediately, for they thought the very sight of the arms might be fatal to them. In the evening, when the blacks had retired to their huts, and our servants were fast asleep, Mr. Stefani and myself, more at ease, surveyed the several valuable articles, the sight of which filled my heart with inexpressible joy. This rich collection occupies the largest part of my catalogue. I was surprised at the number and beauty of the golden articles, and soon discovered that they far exceeded in value every thing of the kind in the different European museums. In respect to the polished carved stones, I soon saw that they not only equalled the best works of that sort among the Greeks, but even surpassed them. Whilst I was yielding myself to those delightful feelings, which an issue so successful, as well as unexpected, would naturally awaken in me, I observed that my friend looked very pensive. I spoke to him about it, and he communicated to me his opinion, that, as we had every thing to fear from the avarice of the blacks, we would do well to escape with our treasures. I, on the contrary, who had been wont for five years to conflict with these savages, and consequently knew their cowardice, rejected the proposal, and concluded to try my fortune at farther discoveries. I therefore quieted my friend, and proposed to bury our treasures in the desert. We made a hole a short distance from our tents, put our costly articles into it, and covered them with earth and sand. The next morning by sunrise we returned to the pyramid, and found all our men already at work—not less than five hundred. Although I had not need now of so many, it occurred to me that it would not be prudent to make them dissatisfied by dismissing the new laborers: so I ordered new searches in the region round about, but entirely without avail.

“As I proceed in my account of the further demolition of the pyramid, I must first remark that after we had destroyed the little cell, in which were the table and treasure, it appeared that the rest of the edifice was constructed of large stones united by a cement. This cement rendered the demolition very difficult, and required fourteen days to take it down to about half of its altitude. At this height, we found nothing but ropes of straw, and bits of wood like mallets. All these were nearly destroyed. In the centre of the pyramid was a niche, or cell, formed by three blocks of stone. We raised them, and first found webs of cotton, which seemed to envelope other things: my heart beat heavily—I expected again to find golden articles; but although we found nothing of this precious metal, yet was I somewhat compensated by the discovery of two bronze vases, of the most elegant form, and so well preserved, that one might suppose they had just come from the hand of the artisan. These vases contained a black, pulverized substance, of which we shall give an analysis. From the before-mentioned height, I had, in twenty days, gone so far as to remove the pyramid down to

the face of the hill ; but I found nothing except huge slabs of a kind of black stone, which in Numidia is called Gallah. The vestibule was still uninjured, and underneath and on one side of it was cut the name Caillaud. It was adorned also with several rows of hieroglyphics. Over against the entrance was a majestic human form sitting on a lion, and holding in his hand something, the exact form of which it was impossible to distinguish. For the benefit of science, I could very much have wished to be able to bring with me one of these interesting stones, but they were of such weight that their transportation over these immense deserts was impossible. I contented myself with carrying away a piece of the stone opposite the door, which I considered the most remarkable, on account of the outline cut out on it. I hoped, in the inside of the pyramid, to find the stairway which I had discovered in the smaller pyramids, and by which we descended into the place of sepulture, but I was disappointed in my hope, being prevented by the monstrous layers of stones called Gallah. I immediately sought to open a way for myself, as I pursued the traces of a foot-path, which led under the vestibule into an open space of about eight feet, and which reached to the declivity of the hill. At the termination of this way, under the vestibule, I set them at work to dig, but we soon found it advisable to cease, as we again met with blocks of stone cemented together. Yet I wished to pursue my researches in these regions, and as I had no longer need of so many laborers, I dismissed a great number of them ; but notwithstanding, they came to the work without being desired, and surveyed our labors with threatening aspect, and brandished lances. This menacing attitude awakened my suspicions. I cautioned my negroes and other servants to watch these men, who were becoming rather dangerous to us. Six days after this, I was informed by one of my faithful slaves, who understood the language of the natives, and had been among them, that these armed savages were planning to seize me and rob me of my treasures. At first, I concluded to attack and destroy them with the aid of my people, but Mr. Stefani counseled me against it. I had compassion on our wives and the family of the Albanian ; and I thought, should any thing serious happen that should reach the Governor's ears, my discoveries might become known, and I be in danger of losing all again. So then, determined rather to flee with my treasures, I awaited the night.

"I sent three of my most trusty slaves with the camels to Berber, a place where the caravans assemble, that pass over the great desert Coruscab, and embarked myself, with Mr. Stefani and our families, on the Nile, at the nearest place to my abode, in a vessel of the Governor, which was always at my disposal.

"After three days I reached Berber, and was well received here by Abas-Aga, Vice-Governor of Nigritia. Eight days I must tarry with him, as he would gladly place me under his protection ; he tendered me, commensurately with his rank, camels and guides to convey me through the desert. So I left Berber, and after two days reached Abu-Achmet, the last village on the road along the Nile. Here live the

Bihsarah, who are so used to travel in the deserts, that they can ride for days without eating or drinking. I here took in a supply of water, and directed my course to the great desert Coruscah, which the blacks call "the sea without water." On the first day I still observed here and there some Gaziah-trees, but the next six days I found myself in an entirely barren desert, amid rocks and scorching sand. In Nubia I had collected some specimens in natural history, as beetles, roll-spiders, crocodiles' eggs with the embryo, grey and crowned cranes, white ibis, a falcon, a calao, and several fruits. I also collected in this desert some rare stones, of a nearly globular form, with a hard outside shell of a ferruginous substance, the inside, however, filled with various colored sand. I could compare it with nothing else than a peach or apricot, when cut into two equal parts. The empty space, left for the stone, represents in this stone the space for the sand.

"On the seventh day we found a spring of very poor water, bubbling up out of the apertures beneath the stones. However, I took in a supply of it, and then pursued my journey. On the twelfth day I reached a place called "the Gates." Here begins a long mountain-chain of black granite; we passed it in two days, and at length arrived at Coruscah, on the east of the Nile, between the first and second cataracts. I returned by the usual route to Cairo. Here I obtained my dismissal, and the arrears of my salary, through the French Consul, Mr. Minaut. To him I made a present of the column of red granite, which I have mentioned as entrusted by me to the chief of Vod-Benaga. After obtaining my leave to depart, and being exposed to new dangers from the plague, which raged in those regions, I had the good fortune once more to see my father-land."

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## ARTICLE XII.

### BIBLIOGRAPHICAL NOTICES.

By the Junior Editor.

#### GREAT BRITAIN.

##### 1.—*The Famous Genevan Testament.*

IN England, as in other parts of Europe, the diffusion of the principles of the Reformation was accompanied with new translations into the vernacular language. But what we have more immediately to speak of at the present time is the handsome edition of the "Famous Genevan Testament," which Messrs. Bagster & Sons have lately published. It is in one volume, small quarto, and to be had for seven shillings! We intend to return to the subject suggested by the early English translations of the Bible, and especially with reference to the exertions which

the eminent publishers of the present volume enable us to mention as fitting themes for particular notice. In the meanwhile, we may observe, with regard to the Genevan Testament, with its "diversities of readings, and most profitable annotations of harde places," that it was the work of a number of the principal reformers who had been driven to Geneva, during the persecutions in Queen Mary's reign. It was printed by Conrad Badius, and was the first in our language which contained the distinction of verses by numerical figures, after the manner of the Greek Testament, which had been published by Robert Stephens in 1551. Stephens indeed, published his figures in the margin, while the Genevan editors prefixed theirs to the beginning of minute subdivisions with breaks, after our present manner. The translators, whose names are pretty accurately ascertained, took up their residence at Geneva about the year 1555. In 1557, there appeared, in a small 12 mo, "The New Testament of our Lorde Jesus Christ, conferred diligently with the Greke, and best approved Translations." It is printed in a small but very beautiful character. A second edition of this Testament, printed at Geneva, with short marginal notes, in the same volume, was published in 1560.—*Monthly Review*.

2.—*Italy, Classical, Historical, and Picturesque, Illustrated and Described*. By W. Brockedon, F. R. S. Parts I, II, III.

A splendid work, whether pen or pencil, typography or artistic illustration, be regarded. Mr. Brockedon is familiar with Italy,—with its scenery, its monuments, its richest collections, and its entire history; and he is an enthusiast about all these to the bargain, and to a poetic degree of fervor. He knows what authors ought to be consulted in a literary sense; and he has a competent taste for the business of selections,—an adequate skill for reducing into an attractive shape that which he selects. And when we add that he has joined to himself such artists as Roberts, Stanfield, Eastlake, &c., the public may rest assured that the pictorial department will require a high excellence and choice judgment to be displayed in the descriptive matter. The large size of the paper not only affords room for, but demands, a breadth and a depth of style in every part of the work, which if followed up with the ability and care manifested in these numbers, will procure and secure for this Italy a consideration which publications of average merit never obtain, or at least do not retain.—*Monthly Review*.

3.—*Translations from the German. Prose and Verse*. By Henry Reeve and John Edward Taylor. London: Murray. 1842.

*Characteristics of Painters*. By Henry Reeve. Second Edition. Murray. 1842.

Two charming little volumes for the drawing-room table; too slight in their pretensions, though not in merit, for anything more serious. They are not books—but tiny wilers away of pleasant half hours. Gentle relaxations from severer studies, or poetical occupants of brief intervals of leisure. The reader now knows what they aspire to—whether to his pocket remains for him to judge.



Of the taste of the editors, and spirit of their translations, the following, from Rückert, may be given as a specimen.

#### THE PEARL.

"From heav'n a tear unconscious fell,  
And, ere 'twas lost within the sea,  
A muscle caught it in its shell,  
And said, 'Bright pearl, I'll shelter thee ;  
Thou shalt not fear the restless waves,  
But sleep with me in ocean's caves.'

"Thou, O my grief, my joy, my rest,  
Bright tear of heaven within my breast !  
Grant, heav'n, that there enshrined may dwell  
Thy purest drop in purest cell."

We must also give a sweet prose specimen from Jean Paul on 'Habitual Cheerfulness':—

"Excessive grief is the heart's suicide ; as the self-murderer is in Silesia buried with his face to the ground, so he who indulges in excessive grief, lies with his face turned earthwards, instead of lifting it, as he ought, to the heaven of the past, the present, and the future. Raise thyself up, O man ! look around thee, and regard something higher and brighter than earth, with its worms and darkness. Cheerfulness, not enjoyment, is our duty ; be it then our aim. In a soul filled with gloominess and mistrust, the heavy stagnant air chokes the growth of all spiritual blossoms. Let your heart open to sweet sympathy and compassion, but not to cold mistrust and dejection : as the flower remains open to the dew, but closes its leaves against the rain. So little is suffering, so much is happiness, a proper part of our nature, that, with equal measures of delusion, we repent only that which has pained, not that which has given joy.

"Great bereavements work afterwards more refreshingly upon the spirit than great joys ; so, on the contrary, minor sorrows weaken more than minor joys strengthen. For after the sun-stroke of rapture, the chambers of the heart are unclosed to all our enemies, whilst excessive grief opens them easily to our friends. But the happiness of life consists, like the day, not in single flashes, but in a steady, mild serenity : the heart lives in this peaceful and even light (were it but moonlight or twilight) its fairest time. The spirit alone can yield us this heavenly calm and freedom from care ; fortune cannot,—for she gives, as she takes away, by starts ; and we feel ever the shocks of fate, whether they lift us up to heaven or cast us down to earth.

"But in what way can man effect this ? Not by planting joys, but in uprooting and removing sorrows ; so that the soil, unchoked by weeds may of itself bear sweet fruits ;—not by man's seeking after joys, and building up for himself heaven upon heaven, which often a single cloud may wholly veil,—but by removing the furies' mask from grief, and uncovering and looking steadily upon its daily actor's face. If man has only once unmasked—that is, conquered—grief, he holds already the garden-key of Eden ; for there remains to him, beside all the higher blessings of circumstance and of duty, the still, untroubled happiness of

existence, which in this freedom from sorrow and joy, can expand in fulness and strength,—a happiness which, although in a lower degree, the savage in his hut, the son of the East under the shadow of his tree, and the countryman on his house-door bench, enjoy likewise; whilst without aught to do or aught to receive, he stretches himself there, quietly and at rest, and looks upon and feels the world without. And this tranquil feeling, not sorrow alone, but rapture too, destroys; for, as it is an abiding feeling, so too, it is a weaker one. Thus have we a perennial forget-me-not of joy within us, but no similar one of pain; and thus is the blue firmament greater than every cloud that is therein, and more lasting too.”—*Westminster Review*.

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GERMANY.

- 1.—*On the Life and Doctrine of Ulfila. Fragments of an unprinted work of the end of the fourth century, published in the name of the Society for old German historical documents, and illustrated by George Waitz. With one fac-simile.* Hanover, 1840.

This document is so remarkable, and of such historical importance, that we shall be pardoned for speaking of it at some length. A Latin manuscript, whose antiquity attracted observation, found by Mr. Knush, who recently died in Paris, was transferred by him to the editor, for more intimate research and better deciphering. It is written in very ancient uncial letters, and contains some writings of Hilary and Ambrose, and at the end, the acts of the Council of Aquileia, A. D. 381. On the margin of many pages, another hand has written another work in italics. This, however, partly through intended mutilation, partly through the improvidence of the book-binder, has been considerably injured. What the editor, by unspeakable pains-taking, has deciphered, we shall sum up, together with his explanations. The author of the marginal writing, in which he gives the speeches of the bishops assembled at the Council of Aquileia, A. D. 381, with his own remarks, is a Bishop Maximinus, who lived at the time of these events, and whose home seems to have been in Illyria. The date of the writing is a little subsequent to A. D. 388. Weighty reasons, however, induce the editor, we think rightly, to conclude that this writing contains the autograph of Maximinus. Among these marginal observations, there are many other statements interlined; the most important are, naturally, the notices of Ulfila, by which the chasms hitherto existing in the life of this great man, are mostly filled up, so that, in connection with the other accounts we already have, we obtain a tolerably perfect image of him. Maximinus calls the author of these brief notices Auxentius, Bishop of Dorostorus—Silistria—one of the principal Arians, who had been educated and instructed by Ulfila himself. According to the account of this Auxentius, Ulfila—for so he is here called, once Hulfila, but not Wulfila—was born about A. D. 318, when the Goths inhabited Dacia beyond the Danube. To his 30th year he was a Lector, then he was ordained Bishop, about A. D. 348, in the reign of Constantius. Seven years he resided, in this capacity, beyond the Danube, until a persecution compelled him,

with a great multitude of confessors, to seek safety in the Roman empire. Constantius assigned them a dwelling-place, south of the Danube, in the mountains of Hæmus, A. D. 355. This renders it necessary to suppose another earlier persecution, than the one mentioned by other writers in A. D. 370. Of the subsequent events in Ulfila's life, Auxentius says but little. For 33 years he lived on Roman soil as bishop, then went to Constantinople, to obtain from the Emperor the promise of a General Council, where he took sick and died, at the age of 70, about the middle of the year 388. The assembled bishops and a large number of Christians who honored and highly esteemed him, buried him with due solemnities, in the city of the Great Constantine, where his grave was discovered by Athanarich. He left behind him a testament, in which he openly again confessed his faith. Here it follows, as far as the editor has been able to decipher it: Ego Ulfila episkopus et confessor semper sic credidi et in hac fide sola et vera testamentum facio ad Dominum meum. Credo unum esse Deum patrem, solum ingenitum et invisibilem, et in unigenitum filium ejus dominum et Deum nostrum, opificem et factorem universe creature, non habentem similem suum. . . ideo unus est omnium Deus, qui et de nostris (?) est Deus . . . et unum spiritum sanctum, virtutem inluminantem et sanctificantem . . . ut ait Cristus propter correctionem ad apostolos (suos): 'Ecce ego mitto promissum patris mei in vobis, vos autem sedete in civitatem Hierusalem quoadusque induamini virtutem ab alto;' item: 'Et accipietis virtutem supervenientem in vos sancto spiritu'—nec Deum, nec Dominum, sed ministrum Cristi . . . nec . . . (sed) subditum et oboedientem in omnibus filio, et filium subditum et oboedientem . . . in omnibus Deo patri . . . per Christum . . . spiritu sancto . . . . .

*Geesdorf's Repertorium.*

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FRANCE.

- 1.—*Man in view of the Bible, or Respective Rights of the Bible on Man, and of Man on the Bible.* By M. Ph. Boucher. Paris, 1841.
- 2.—*Lucille, or The Study of the Bible.* By M. Ad. Monod. Montauban, 1841.
- 3.—*The Right of all Men to read the Bible, proved by unexceptionable testimonies.* By M. Ph. J. Oster. Toulouse, 1841.

These three works are indicated here in the order of publication. They are distinguished by very different merits, and are in some sort complements to each other. The first two have been sometime before the public, and are highly appreciated: the third, although not equal to the other two, especially the second, in purity, elegance, and vigor of style, will nevertheless hold an honorable place with them. What constitutes its chief merit is that, whilst it does not neglect principles, it relies above all on facts. It exhibits a plenitude of reason, a force of argument, which it seems difficult to resist. It is not a simple duplicate of the ancient controversy, a resuscitation of some old ideas; it is, in many respects, an original book, which, diving into the historic sources,

brings out to notice some arguments scarcely before hinted at in this controversy.—*Revue Théologique*.

- 4.—*French Works of Calvin, collected for the first time, with an Introduction containing his Life. By Theodore Beza : and a Bibliographical Notice. By Paul L. Jacob. Paris, 1842.*

“The style of Calvin is one of the grandest styles of the sixteenth century : simple, correct, elegant, clear, ingenious, lively, varied, it began to fix the French language of prose, as that of Clement Marot did for verse. It is less erudite, less elaborate, less wrought, so to speak, than the style of Rabelais ; but it is more prompt, more simple, and better adapted to express all the shades of thought and sentiment. It is less naïf, less agreeable, less rich, than that of Amyot, but it is more incisive, more imposing, and more grammatical. It is less capricious, less colored, and less alluring than that of Montaigne, but more concise, more grave, and more French—if we may charge the author of *Essais* with sometimes writing *à la gasconne*.”

This appreciation of Calvin's style by the bibliophilist Jacob—M. P. Lacroix—is appropriate to the announcement of a book, destined, above all, to make us acquainted with the services the reformer has rendered to our language. This is, of all his claims to recognition, the least contested, but perhaps also the most forgotten. It was a happy idea to precede his works by Theodore Beza's *Life of Calvin*. Never, perhaps, was eulogy more simple. What a high conception it gives us of the man who has been thus simply eulogized !—*Le Semeur*.

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#### TURKEY.

- 1—*Abridgment of Roman History, from the building of Rome to the Destruction of the Western Empire. Translated from the work of the learned Goldsmith, with additional notes. Venice, in the Cloister San Lazzaro, 1830.*

Every one is acquainted with the History of Rome by Oliver Goldsmith, which has been translated into almost all the languages of Europe. This is the Turkish translation of it. In the preface, the unknown translator gives an account of his undertaking : for although the Armenian translation of Rollin's History of Rome by Emanuel Tschaktschak, in six quarto volumes, had appeared a few years before, he considers it too copious and voluminous ; and thinks also a Turkish work of an abridged history desirable for those who are not familiar with the Armenian, as also for schools. The translation is faithful, and purely Turkish. The Appendix, of 26 pages, contains an explanation of the historical and geographical objects and terms which occur.—*Jahrbücher der Litteratur*.



- 2.—*Translation of some Spiritual Poems from the Works of the Poet Metastasio.* By Baron Johannes Jeremian. Venice, 1839.

Baron Jeremian, of Constantinople, the translator of Young's Night Thoughts into prose, has again taken up a metrical work. The opere sacre of Pietro Metastasio, besides their unquestioned poetical merit, have a rigidly rhythmical form, in which the author was aided much by the language itself. To construct this master-work of the rhythm of so rhythmical a language as the Italian, into Turkish, giving even the rhymes as they occur in the original, is only to be done by a translator, who, like Baron Jeremian, has the language perfectly at command, and all its means subject to his call. He has selected the five most beautiful of the eight opere sacre of Metastasio. 1. La Morte d' Abele. 2. Isacco, figura del Redentore. 3. Giuseppe riconosciuto. 4. La Passione di Gesù Cristo. 5. Betulia Liberata.

### ARTICLE XIII.

#### SELECT LIST OF RECENT PUBLICATIONS.

By the Junior Editor.

#### GREAT BRITAIN.

SCHILLER'S Song of the Bell—German and English. By T. J. Arnold. London.

The Theory of Taste founded on Association tested. By Sir G. S. Mackenzie. London.

History of the French Revolution, with reference to the fulfilment of Prophecy. By Rev. F. Fysh. London.

Elements of Mental and Moral Science. By G. Payne, L. L. D. Second edition. London.

A Translation and Exposition of the Book of Psalms. By Rev. J. Fry.

Mesopotamia and Assyria. By J. B. Fraser, Esq. London.

Journal of a Tour in Greece and the Ionian Islands. B. W. Mure. London.

Christian Examples for Young Persons. By Miss Strickland. London.

Practical Observations on Nervous Diseases. By Dr. G. R. Rowe. Fourth Edition. London.

\* Power of the Passions, and other Poems. By Mrs. Ware. London.

German Grammar. By W. Wittich. London.

England, in 1841. By Fred. Von Raumer. London.

#### GERMANY.

Ludwig Philipp der Erste, König der Franzosen. von Dr. Chr. Birch. Bd. I. Stuttgart.

*Yahrbuch für 1841.* von H. C. Schumacker, mit Beiträgen von Dove, Kämtz, Lehmann, Mädler, Olbers, Quetelet. Stuttgart.

*Zion und Jerusalem.* Nebst einem Abhange über den goldenen Rauchaltar und die levitischen Schaubrode. von J. F. Oberlin. Stuttgart.

*Über Inhalt und Zusammenhang der Metaphysischen Bücher des Aristoteles.* von Dr. J. E. W. Brummerstädt. Rostock.

*Die deutsche poetische Literatur seit Klopstock und Lessing.* Nach ihren ethischen und religiösen Gesichtspunkten. von Dr. H. Gelzer. Leipzig.

*Celtica II.* Versuch einer genealogischen Geschichte der Kelten. von Dr. Lor. Diefenbach. Stuttgart.

*Georg Wilhelm Friedrich Hegel's Wissenschaft der Logik.* von Dr. Leopold von Henning. Berlin.

*Heilung der Schwerhörigkeit durch ein neues, höchst einfaches Verfahren zur Einleitung von Dämpfen in die Ohrtrumpete.* von Dr. Ph. H. Wolff. Berlin.

*Das System der Willensbestimmungen oder die Grundwissenschaft der Philosophie.* von Dr. Jac. Fr. Reiff. Tübingen.

*Reformatoren vor der Reformation, vornemlich in Deutschland und den Niederlanden, geschildert.* von Dr. E. Ullman.

*Nestorians, the lost Tribes.* By Dr. Grant. Basel.

*Mittheilungen über Goethe, aus Mündlichen und Schriftlichen, gedruckten und ungedruckten Quellen.* von Dr. Fr. Wilh. Reimer. Berlin.

*Die Gymnastik und Agonistik der Hellenen.* von Dr. Johann Heinrich Krause. Leipzig.

#### FRANCE.

*Mémoire sur la vraie constitution de l'atmosphère terrestre, déduite à l'expérience:* par Biot. Paris.

*Dictionnaire égyptien en écriture hiéroglyphique:* par Champollion lejeune. Paris.

*Essai sur la vie et les doctrines de F.-C. de Savigny:* par Laboulaye. Paris.

*L'anti-magnétisme animal:* par Tissot. Paris.

*Dix années d'épreuves pendant la révolution:* par M. Charles Lacroix, membre de l'Académie française et professeur d'histoire à la faculté des lettres. Paris.

#### SPAIN.

*L'Espana Artistica y Monumental.* London.

*La Moderacion de los moderados Espanoles.* Paris.

#### ITALY.

*Guida dell' Educatore, 1838-9-40.* Firenze.

*Tavole Cronologiche e Sincrone della Storia Fiorentina,* compilate da Alfredo Reumont. Florence.

#### POLAND.

*Historya Literatary Polskiej.* Tom. III: pr. Prof. M. Wiszniewskiego. Krakow.—*History of the Polish Literature.* Vol. III; by Prof. M. Wiszniewski. Cracow.